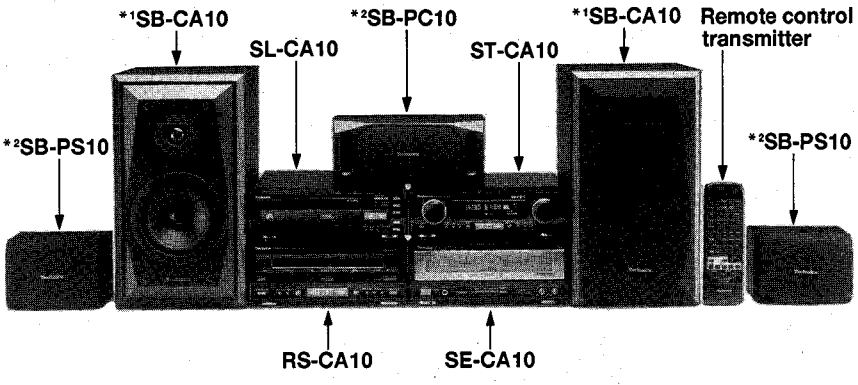
ORDER NO. AD9512270C8

Service Manual

Tuner

ST-CA10

Tuner



Because of unique interconnecting cables, when a component requires service, send or bring in the entire system.

Colour

(K)...Black Type

Area

Suffix for Model No.	Area	Colour
(E)	Europe.	(K)
(EB)	Great Britain.	
(EG)	Germany and Italy.	
(GC)	Asia, Latin America, Middle Near east and Africa.	

SPECIFICATIONS

System: SC-CA10

■Pre-amplifier section

Input sensitivity/impedance	
PHONO	2.5 mV/ 47 kΩ
EXTERNAL, VCR, VDP	150 mV/15 kΩ
Output level	
EXTERNAL/ VCR REC OUT	150 mV/1.5 kΩ
Frequency response	
PHONO	30 Hz −15 kHz/+1.5 to −2.0 dB
EXTERNAL, VCR, VDP	20 Hz—40 kHz
S/N	
PHONO	DIN 75 dB (77 dB, IHF)
EXTERNAL, VCR, VDP	DIN 83 dB (85 dB, IHF)

■DOLBY PRO LOGIC section

PRO LOGIC mode	SURROUND, 3 STEREO
CENTER mode	NORMAL, WIDE, PHANTOM
DELAY TIME	15, 20, 25, 30 ms.

■FM tuner section

Frequency range	87.50—108.00 MHz (0.05 MHz steps)
Sensitivity	1.8 µV (IHF usable)
S/N 26 dB	1.5 µV
S/N	
MONO	70 dB (75 dB, IHF)
Stereo separation	
1kHz	35 dB
Antenna terminal(s)	75Ω (unbalance)

■AM tuner section

Frequency range	
[For (E, EB) areas]	
MW	522—1611 kHz (9 kHz steps) 530—1620 kHz (10 kHz steps)
LW	144—288 kHz (9 kHz steps)
[For (EG, GC) areas]	
AM	522—1611 kHz (9 kHz steps) 530—1620 kHz (10 kHz steps)
Sensitivity (S/N 20 dB)	
[For (E, EB) areas]	
MW	500 µV/m
LW	50 µV
[For (EG, GC) areas]	
AM	500 µV/m

■Timer section

Clock	Quartz-lock type
Function	24-hour programmable Play timer (1 time), Rec timer (1 time) Sleep (120 min., 30 min. intervals)
Setting	1 minute—23 hours 59 minutes (1 min. intervals)

■General

Dimensions (W×H×D)	280×89×291 mm
Weight	1.75 kg

Note:
Specifications are subject to change without notice.
Weight and dimensions are approximate.

System	Tuner	CD changer	Amplifier	Cassette deck	Speakers
SC-CA10	**ST-CA10**	SL-CA10	SE-CA10	RS-CA10	*1 SB-CA10 *2 SB-PT10 (SB-PC10+SB-PS10)

*1 Made in PAES
*2 For (E, EB, EG) areas....Made in PAES
For (GC, GN) areas....Made in NABEL

⚠ WARNING

This service information is designed for experienced repair technicians only and is not designed for use by the general public. It does not contain warnings or cautions to advise non-technical individuals of potential dangers in attempting to service a product. Products powered by electricity should be serviced or repaired only by experienced professional technicians. Any attempt to service or repair the product or products dealt with in this service information by anyone else could result in serious injury or death.

Technics®

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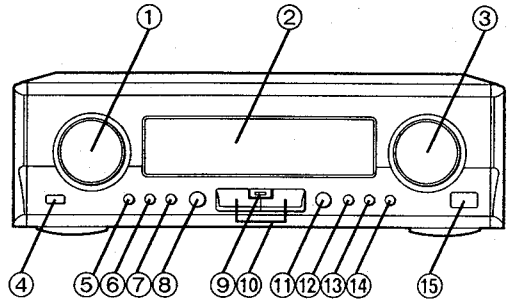
NOTE:
Refer to the service manual for Model No. SE-CA10 (ORDER No. AD9512272C8) for information on "ACCESSORIES", "INSTALLATION ", "CONNECTIONS" and "PACKAGING".

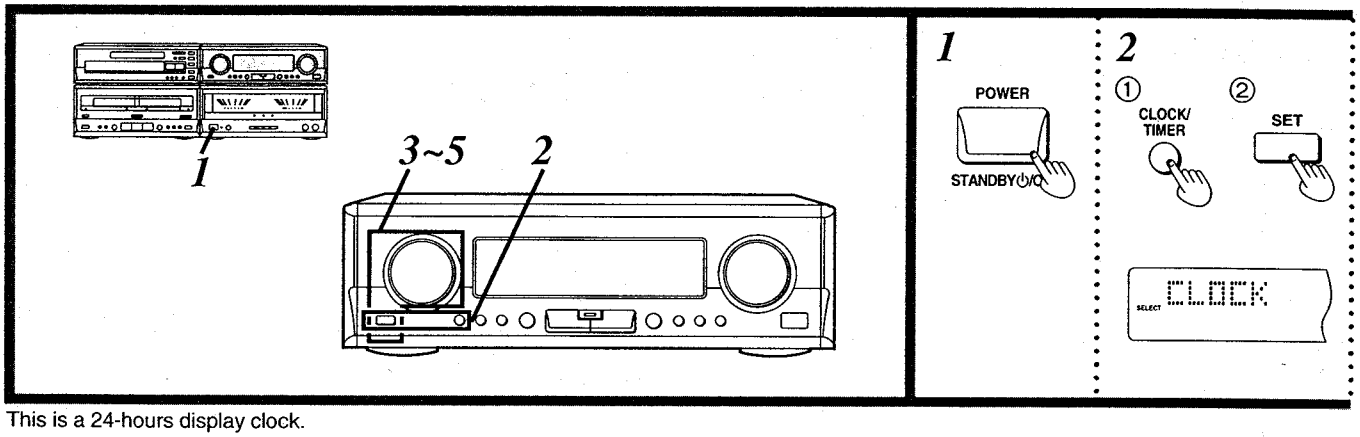
■LOCATION OF CONTROLS



① **JOG control (JOG)**
② **Display**
③ **Volume control (VOLUME)**
④ **Set button (SET)**
⑤ **Clock/timer button (CLOCK/TIMER)**
⑥ **Record timer button (◴ REC)**
⑦ **Play timer button (◴ PLAY)**
⑧ **Tuning mode select button (TUNING MODE)**
⑨ **Tuner indicator (TUNER)**
⑩ **Band select button (FM, LW/MW)**
⑪ **Source input select button (INPUT SELECTOR)**
⑫ **Display mode select button (DISP MODE)**
⑬ **PTY select button (PTY SELECT)**
⑭ **PTY search button (PTY SEARCH)**
⑮ **Remote control signal sensor (SENSOR)**

Note: ⑫, ⑬, ⑭: For [E, EG] areas.

■SETTING THE TIME



This is a 24-hours display clock.
These instructions explain how to set the timer for 16:25 (4:25 p.m.) on Wednesday.

1 **Switch on the power.**
The very first time you turn ON the power or whenever you turn it ON after having unplugged and plugged the stereo in again, you will hear the sound of the tray mechanism. There is nothing wrong with your CD changer. This happens because of initial settings.

2 **① Press CLOCK/TIMER to show "CLOCK".**
Within 10 seconds:
② Press SET.

3 **① Turn JOG to select the day.**
② Press SET.

4 **① Turn JOG to select the hour.**
② Press SET.

5 **① Turn JOG to select the minutes.**
② Press SET to finish setting the time.

The display will return to the previous display after about 3 seconds.

When "SUN 0:00" flashes:
It flashes when you connect the AC power supply cord for the first time or if there has been a power failure.
If this happens, reset the time.

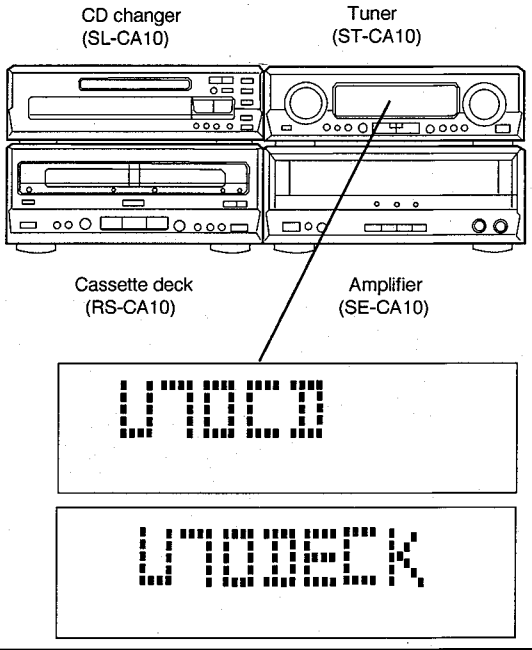
If the minutes setting has gone wrong:
1. Press CLOCK/TIMER.
2. Press SET 3 times.
3. Turn JOG to set the minute, and then press SET.

To display the clock again:
Press CLOCK/TIMER.
The clock display will appear for about 10 seconds.

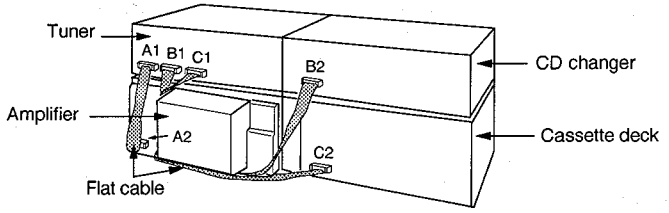
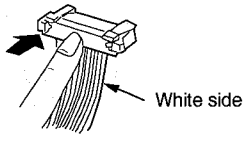
For your reference:
When you turn OFF the power from the POWER button, the stereo goes on standby and the STANDBY lamp lights up.

■ABOUT THE SELF-DIAGNOSTIC MODE

This unit is equipped with a self-diagnostic function which, in the event of a malfunction, automatically displays a code indicating the nature of the malfunctions. Use this self-diagnostic function when servicing the unit.

Display method	Display location
To display the malfunction code U70 CD: U70 DECK:.... Automatically displays on the tuner when a malfunction occurs. F61 ..... Automatically displays on the tuner when a malfunction occurs. **To return to the normal display** **1. For U70 CD/U70 DECK:** • Press an any operation button on the tuner. • To re-display the code, switch the power off (POWER STANDBY button), and then switch power back on again. **2. For F61:** • If "F61" is displayed, the power will automatically be switched off and the standby indicator will light up. • "F61" will be displayed for 3 seconds, and then the clock will be displayed. • To re-display the code, switch the power on. "F61" will be redisplayed, and then after 3 seconds the clock will be displayed and the power will automatically switch off.	

Display contents

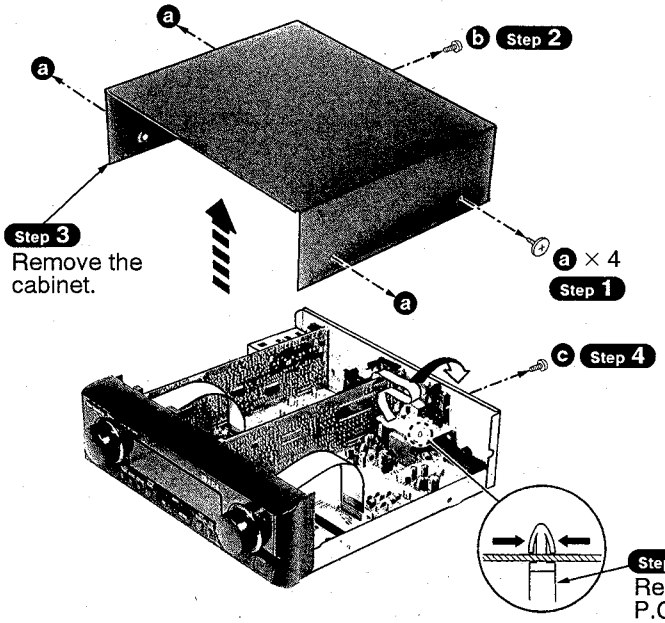
Display code	Problem or condition	Correction procedure
U70 CD **U70 DECK** (displayed automatically)	A bus-line communications error has occurred as a result of the flat cables being inserted incorrectly, thus preventing the system from operating. 1. If "U70" is displayed on the tuner, the Cassette deck or CD changer cannot be operated by remote control.	 1. To check for correct insertion of the flat cables ①Match each connector with the color (black/ white) of the connection port and insert until you hear a click. ②Insert the flat cables at the back of the unit in the order indicated. Make sure the white side of the cable is on your right side.  2. Breakage of flat cable (Check and replace as necessary.) 3. If the problem is not corrected by items (1.) and (2.) above, this indicates a faulty IC. **ST-CA10:** IC901 (M38198MC064F) **SL-CA10:** IC401 (LC66538A4G99) **RS-CA10:** IC701 (M37471M4264F) Check these IC's and replace as necessary.
F61	When the power switch is switched on, it automatically switches back off, making it impossible to switch power on.	• Faulty amplifier (SE-CA10) output IC (IC501). (When a DC voltage is applied to the speaker terminals.)

■ Operation Check and Main Component Replacement Procedures

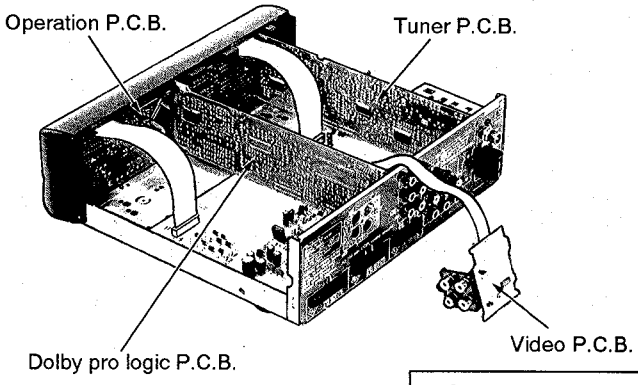
NOTE

1. This section describes procedures for checking the operation of the major printed circuit boards and replacing the main components.
2. For reassembly after operation checks or replacement, reverse the respective procedures. Special reassembly procedures are described only when required.
3. Illustrated screws are equivalent to actual size.

1. Checking for the tuner P.C.B., dolby pro logic P.C.B., operation P.C.B. and video jack P.C.B.

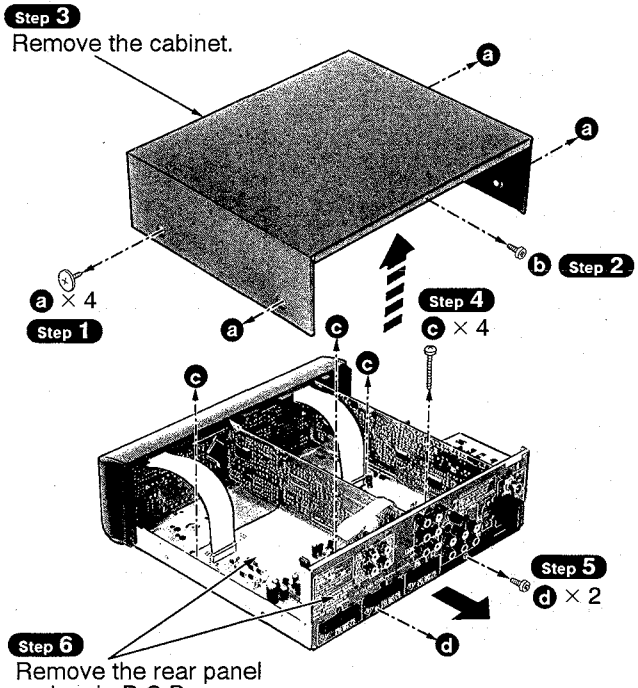


• Check the tuner P.C.B., dolby pro logic P.C.B., operation P.C.B. and video jack P.C.B. as shown below.

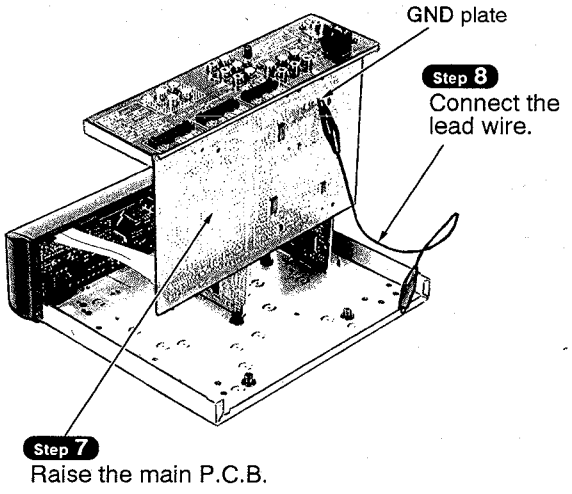


a (Black) [RHD30007–K1]
b (Black) [XTB3+8JFZ]
c (Black) [XTBS3+8JFZ1]

2. Checking for the main P.C.B.



• Check the main P.C.B. as shown below.



a (Black) [RHD30007–K1]
b (Black) [XTB3+8JFZ]
c (Black) [XTB3+16JFZ]
d (Black) [XTBS3+8JFZ1]

■TO SUPPLY POWER SOURCE

This unit ST-CA10 is designed to operate on power supplied from the Amplifier SE-CA10. When operating the unit ST-CA10 alone for testing and servicing, without having power supplied from the Amplifier SE-CA10, use the following method.

Power Supply to Main Circuit

1. Short the section between the test points **TP602** and **TP610**, and as well as the section between the test points **A.GND** (J611) and **TP610**.
2. Connect the 3V AC power to pin 1 of the indicator module FL901 and the GND terminal to pin 57 of the same FL901 module.
3. Apply 11V AC power to the section between the point **TP601** (**AC**) and the point **TP602** (**CT**) as well as the section between the point **TP603** (**AC**) and the point **TP602** (**CT**). This unit comes to stand-by mode.
4. Short the section between the jumper **J315** **TP611** and the point **D.GND** of the jumper **J608** **TP610** for a moment. The main circuit comes to power ON mode. (Whenever this operation is performed, power, ON/OFF mode is repeated.)

Power Supply to Tuner Circuit

1. Apply power source to the main circuit.
2. Connect the DC +12V terminal to the jumper **J610** **TP608**, and the GND terminal to both the point **T.GND** of the jumper **J609** **TP609** and the point **D.GND** of the jumper **J608** **TP610** using the DC power supply tool.

Note: If the GND terminal of the DC power supply tool is connected to the point **D.GND** of the jumper **J608** **TP610**, an error occurs in measurement values for voltage and waveform.

To Check Signals

Connect the oscilloscope or the speaker with the built-in amplifier to the EXTERNAL (OUT) terminals and check if the signals are outputting from this unit.

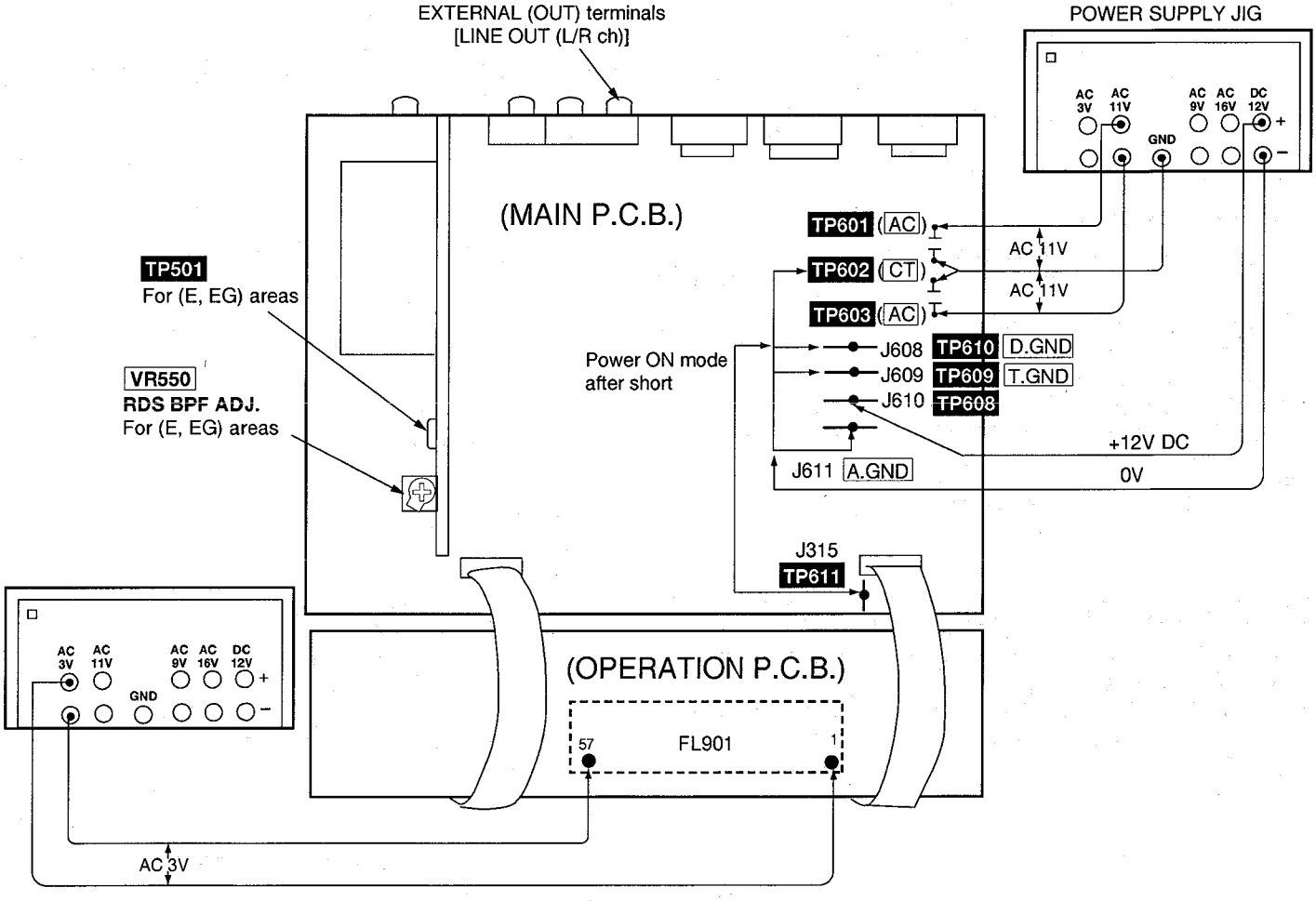


Fig. 1

■ MEASUREMENTS AND ADJUSTMENTS [For (E, EG) areas.]

Measuring Instruments and Special Tools

- FM signal generator (FM-SG)
- RDS modulator
- AC electronic voltmeter (AC EVM)*
  (*Min. 0.3 mV measurable)
- 75Ω coaxial cable

RDS (Radio Data System) BPF Adjustment

1. Test equipment connection is shown in Fig. 2.
2. Set the unit to "**FM**" mode.
3. Set the radio frequency display and signal generator to **100.10 MHz.**
4. Adjust **VR550** so that the **TP501** output is maximized.

FM Signal Generator Condition

Modulation 100%
Modulation frequency 1kHz
RDS modulation 2.7%
Output level 60dB

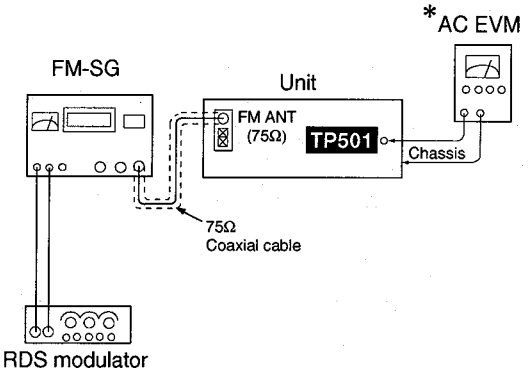


Fig. 2

How to make simple adjustment without using a RDS modulator

1. Tuner into a FM broadcasted with a RDS signal transmitted from a FM station whose electric field intensity is more than 50 dB.
2. Adjust **VR550** so that the **TP501** output is maximized.

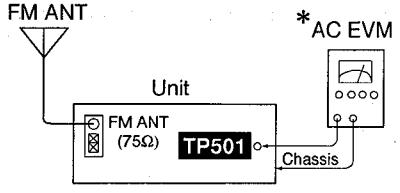


Fig. 3

Note: * Use the voltmeter measurable up to 0.3 mV at the minimum.

● What is RDS (Radio Data System)?

RDS is a multiplex broadcasting system which adds a variety of message signal to the audio signals of FM broadcasts.
This unit can utilize the following signals among the various RDS signals.

RDS meeeages used by this unit

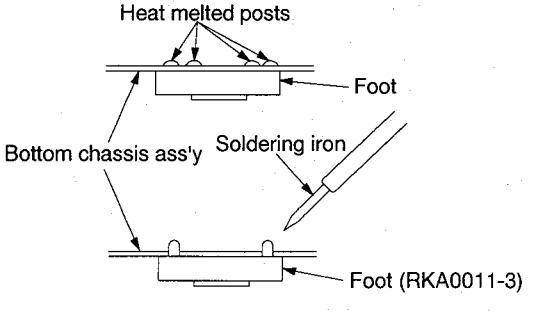
- **PS** (Program service name)
  Name of the broadcast station
- **PTY** (Program type)
  Identification signal for program types such as news and sport

Note

"PTY" may not be available in some areas.

■ REPLACEMENT OF THE FOOT

1. Remove the 4 heat melted posts on the Bottom chassis ass'y with a pair of nippers or similar tool.
2. To replace the foot (RKA0011-3) on the Bottom board ass'y melt the 4 posts with a soldering iron.



■SCHEMATIC DIAGRAM (Parts list on pages 39～46.)

- This schematic diagram may be modified at any time with development of new technology.

A TUNER CIRCUIT For (E) area ..... 8～10
A TUNER CIRCUIT For (EG) area ..... 11～13
A TUNER CIRCUIT For (EB) area 14, 15
A TUNER CIRCUIT For (GC) area 16, 17
B OPERATION CIRCUIT 18, 19
C MAIN CIRCUIT ..... 20～23
D DOLBY PROLOGIC CIRCUIT ..... 24～26
E VIDEO CIRCUIT 24

Notes:

- **S901**: FM switch (FM)
- **S902**: LW/MW select switch (LW/MW)... **For (E, EB) areas.**
  AM switch (AM)... **For (EG, GC) areas.**
- **S903**: Tuning mode select switch (TUNING MODE)
- **S904**: Play timer switch (◴ PLAY)
- **S905**: Record timer switch (◴ REC)
- **S906**: Clock/ timer switch (CLOCK/TIMER)
- **S907**: Set switch (SET)
- **S911**: Source input select switch (INPUT SELECTOR)
- **S912**: Display mode select switch (DISP MODE)... **For (E, EG) areas.**
- **S913**: PTY select switch (PTY SELECT)... **For (E, EG) areas.**
- **S914**: PTY search switch (PTY SEARCH)... **For (E,EG) areas.**
- Indicated voltage values are the standard values for the unit measured by the DC electronic circuit tester (high-impedance) with the chassis taken as standard. Therefore, there may exist some errors in the voltage values, depending on the internal impedance of the DC circuit tester.

- Voltage values and waveforms are measured as indicated in the schematic diagram when test points between **TP602** and **TP610**, and between **TP610** and **A. GND**, and between **TP609** and **A. GND** are shorted.

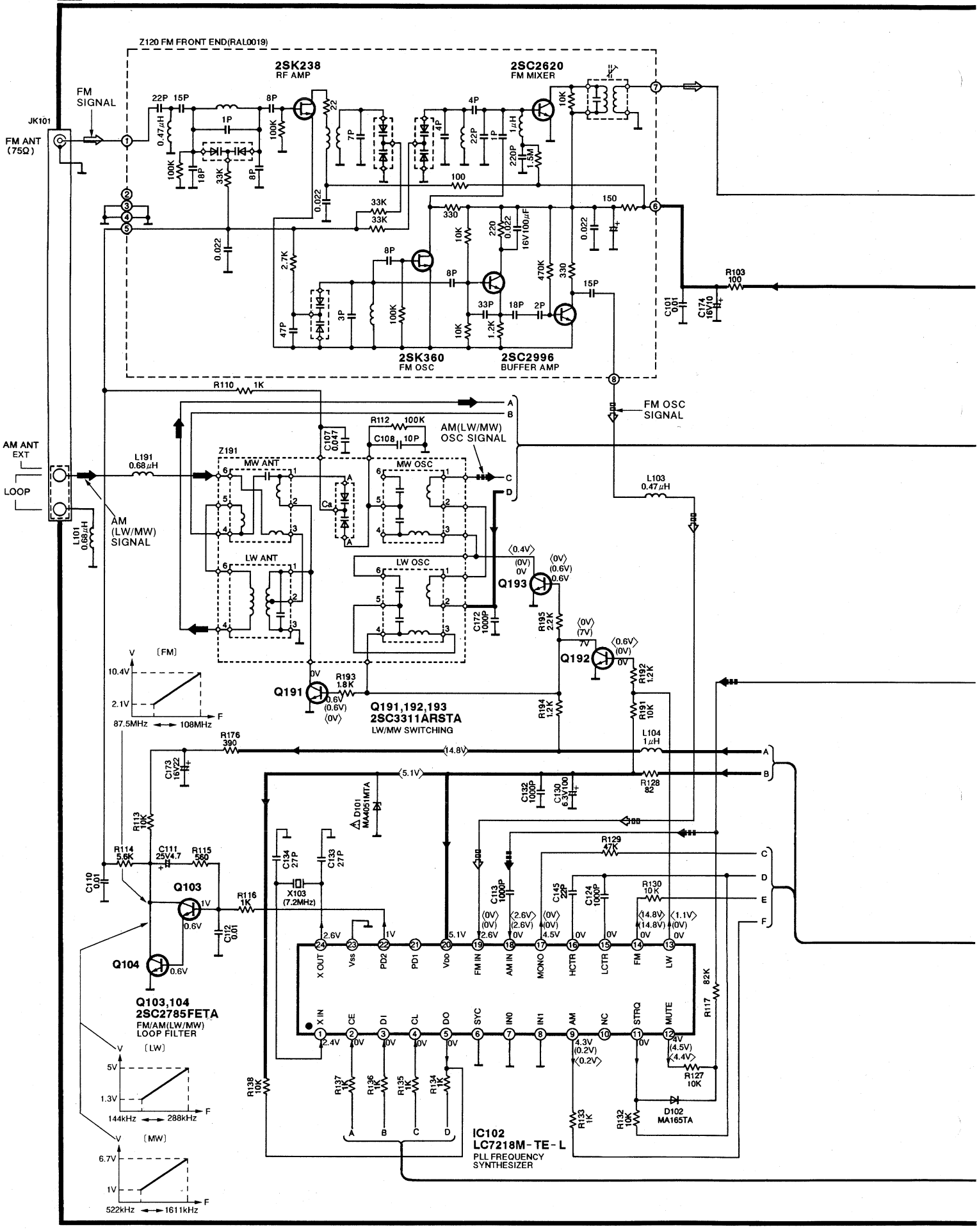
No mark: FM mode ( ): AM (MW) mode < >: AM (LW) mode

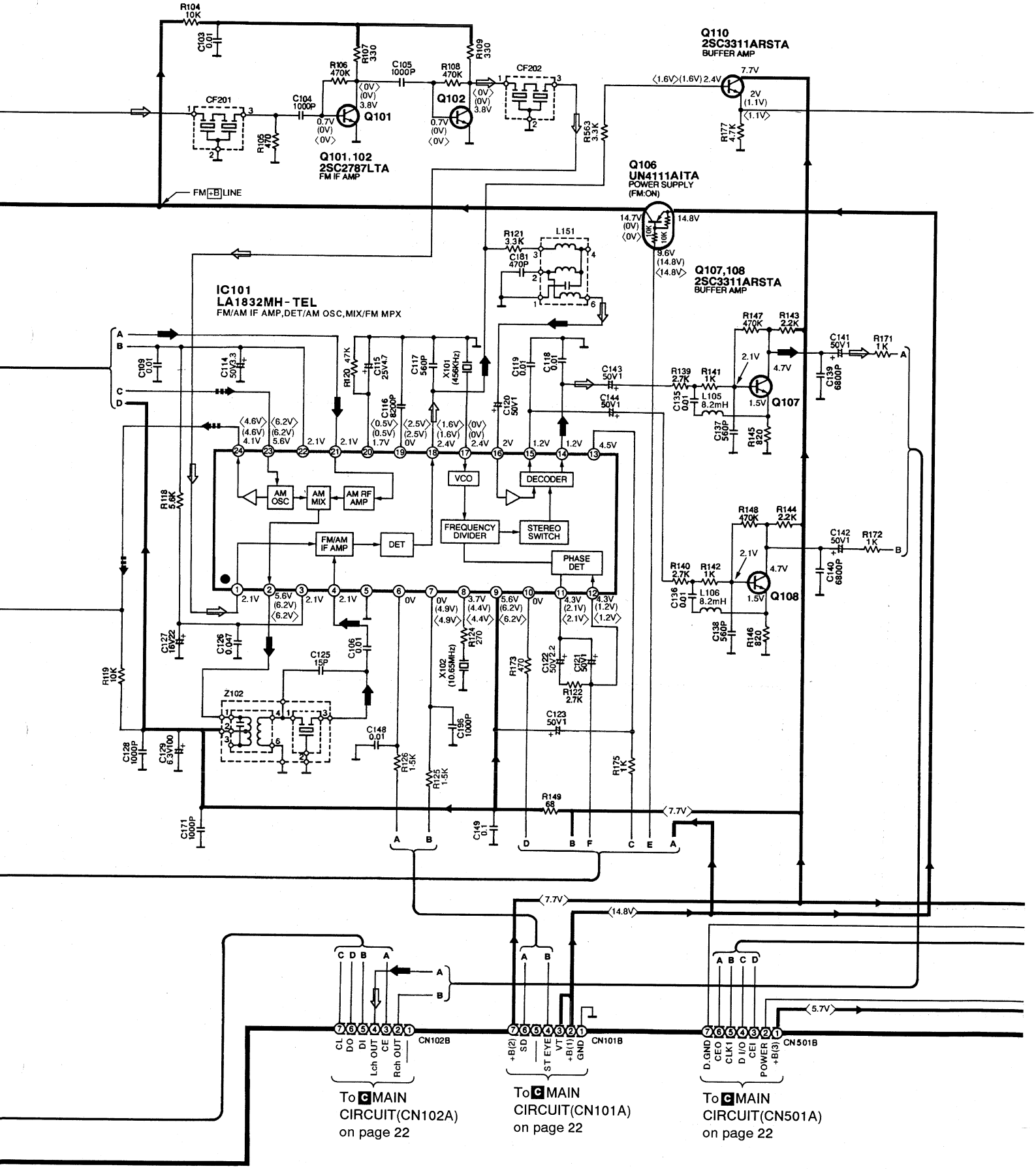
- Important safety notice:
  Components identified by ⚠ mark have special characteristics important for safety.
  Furthermore, special parts which have purpose of fire-retardant (resistors), high-quality sound (capacitors), low-nose (resistors), etc. are used.
  When replacing any of components, be sure to use only manufacturer's specified parts shown in the parts list.
- **Caution!**
  IC and LSI are sensitive to static electricity.
  Secondary trouble can be prevented by taking care during repair.
  Cover the parts boxes made of plastics with aluminum foil.
  Ground the soldering iron.
  Put a conductive mat on the work table.
  Do not touch the legs of IC or LSI with the fingers directly.

- Voltage and signal line

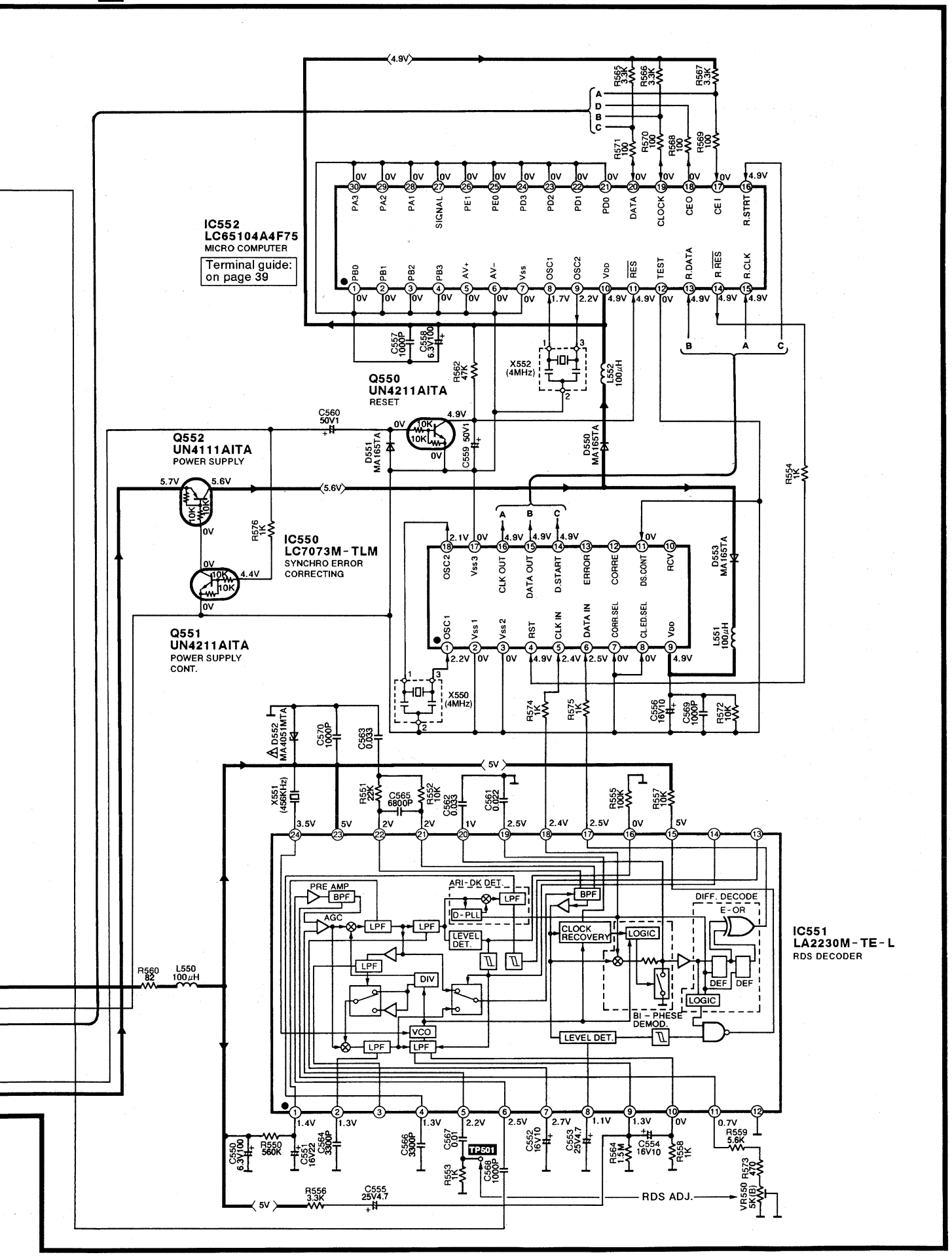
: Positive voltage line
: Negative voltage line
: FM signal line
: FM OSC signal line
: AM (LW/ MW) signal line
: AM (LW/MW) OSC signal line
: REC OUT line
: Center speaker drive signal line
: Surround speaker drive signal line

A TUNER CIRCUIT For 〔E〕 area. (P.C. Board: on page 27)

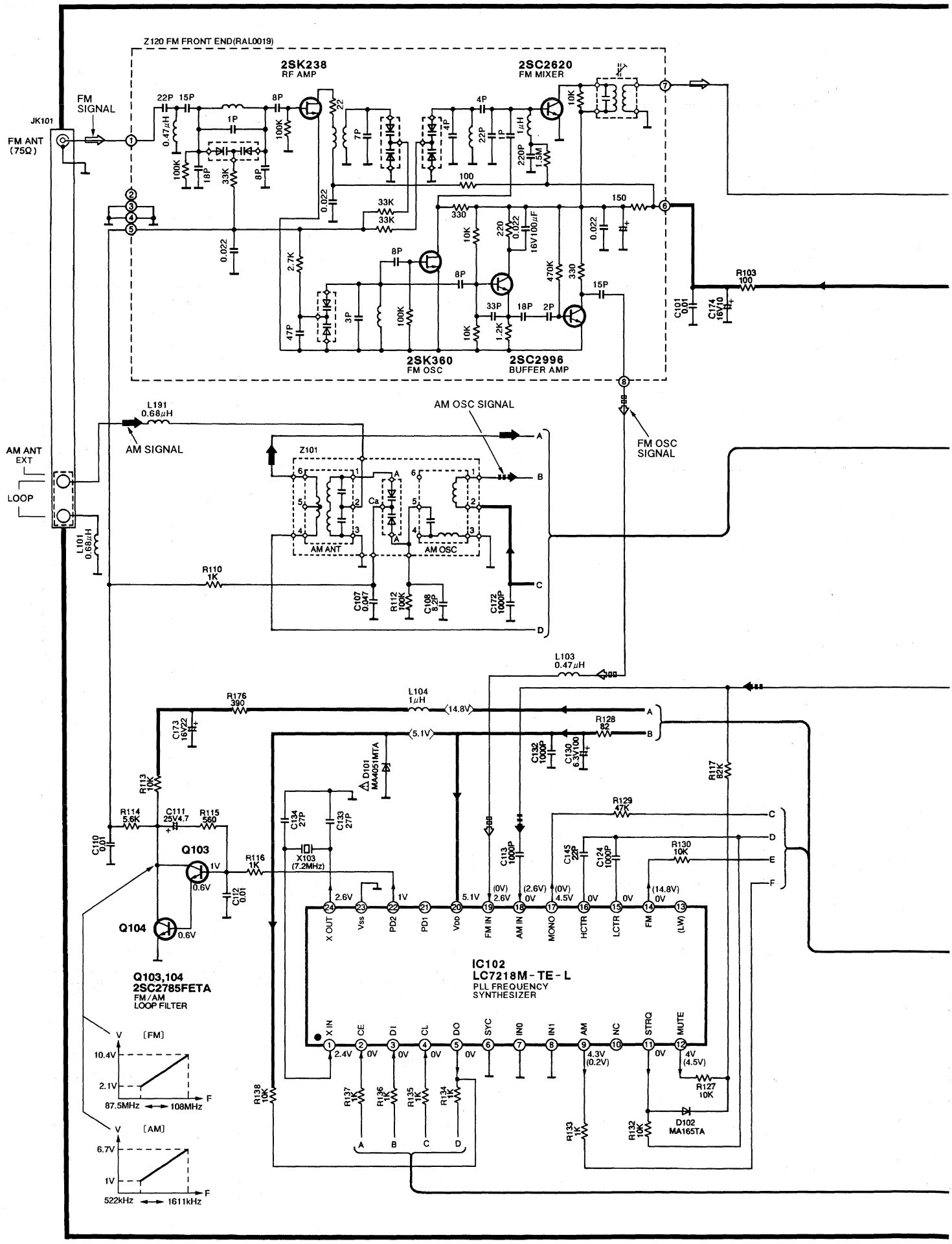


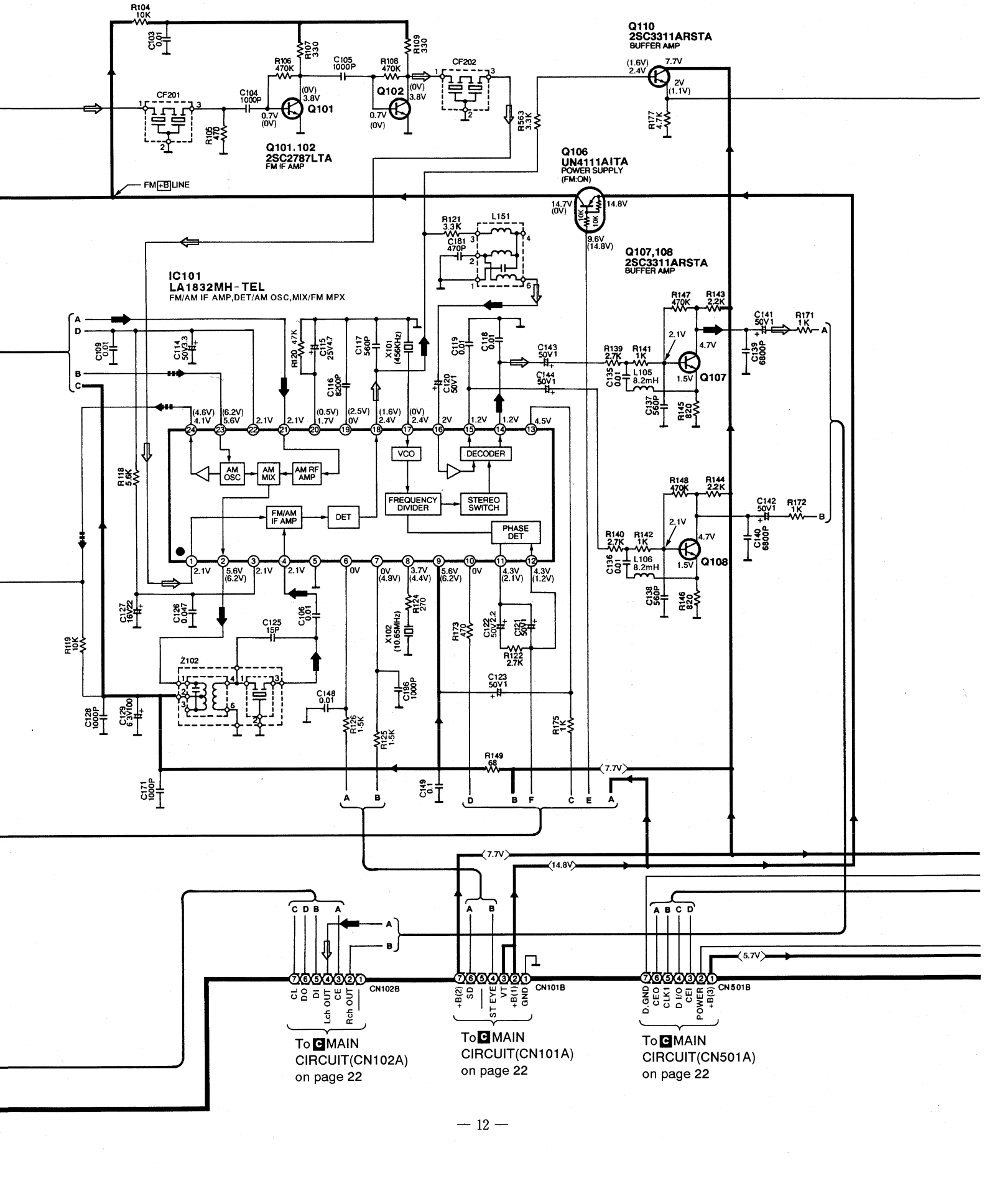

Q110
2SC3311ARSTA
BUFFER AMP
Q101, 102
2SC2787LTA
FM IF AMP
Q106
UN4111AITA
POWER SUPPLY
(FM:ON)
FM+B LINE
IC101
LA1832MH-TEL
FM/AM IF AMP,DET/AM OSC,MIX/FM MPX
Q107,108
2SC3311ARSTA
BUFFER AMP
Q107
Q108
AM OSC
AM MIX
AM RF AMP
VCO
DECODER
FREQUENCY DIVIDER
STEREO SWITCH
FM/AM IF AMP
DET
PHASE DET
CN102B
CN101B
CN501B
CL
DO
DI
Lch OUT
CE
Rch OUT
+B(2)
SD
ST EYE
VT
+B(1)
GND
D.GND
CEO
CLK1
D I/O
CEI
POWER
+B(3)
To C MAIN CIRCUIT(CN102A) on page 22
To C MAIN CIRCUIT(CN101A) on page 22
To C MAIN CIRCUIT(CN501A) on page 22

A TUNER CIRCUIT For [E] area. (P.C.Board:on page 27)

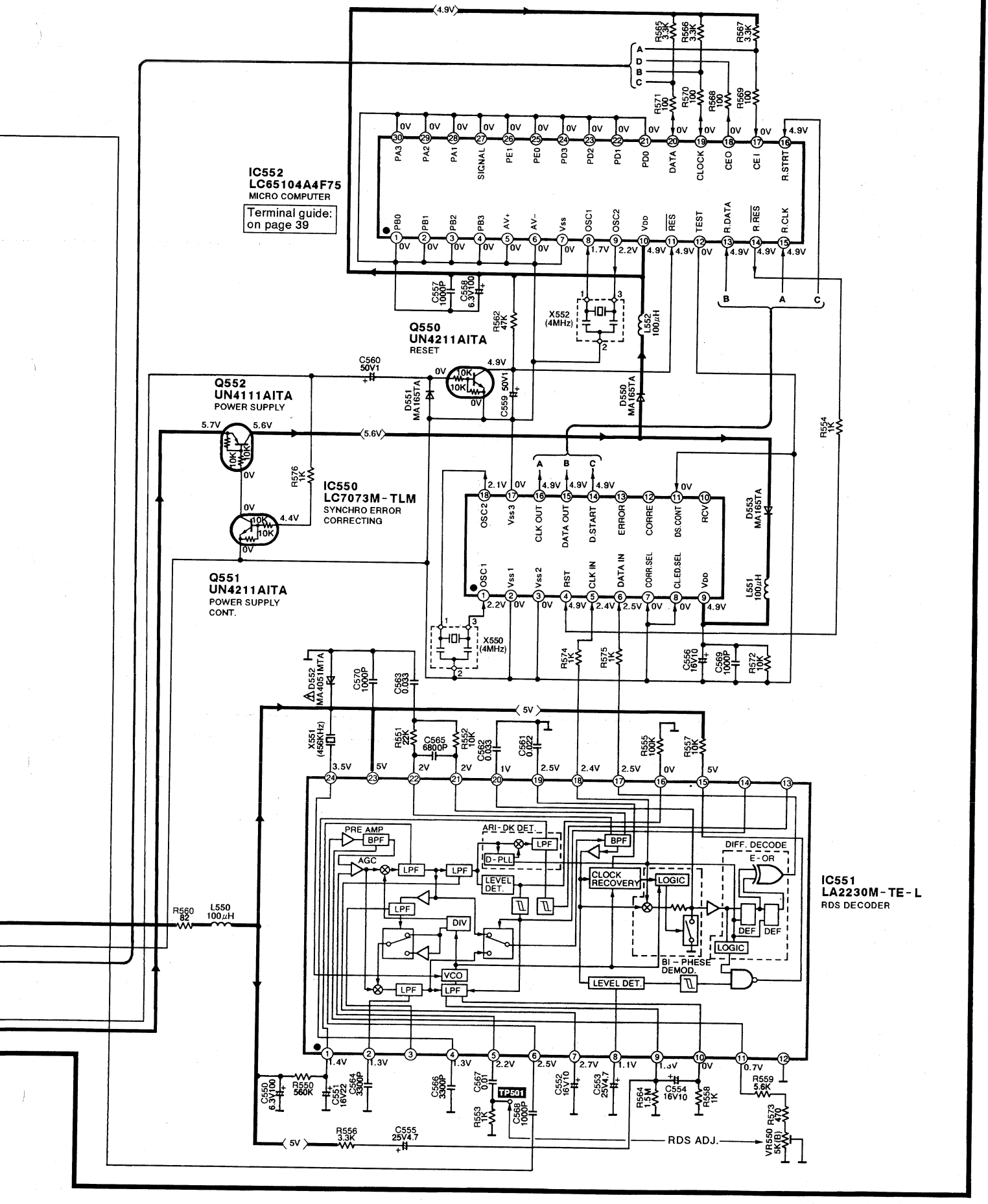


A TUNER CIRCUIT For [EG] area. (P.C. Board: on page 27)

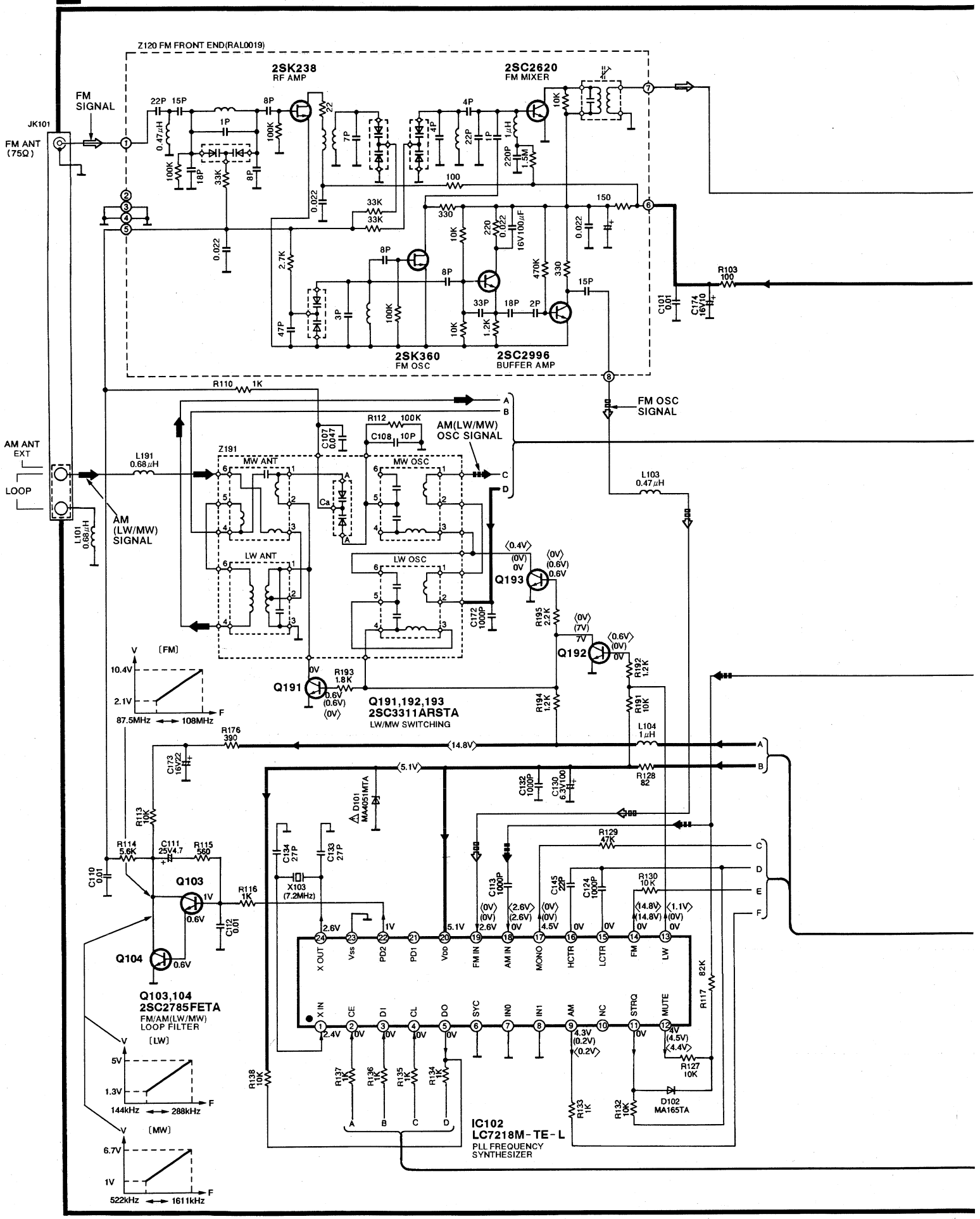


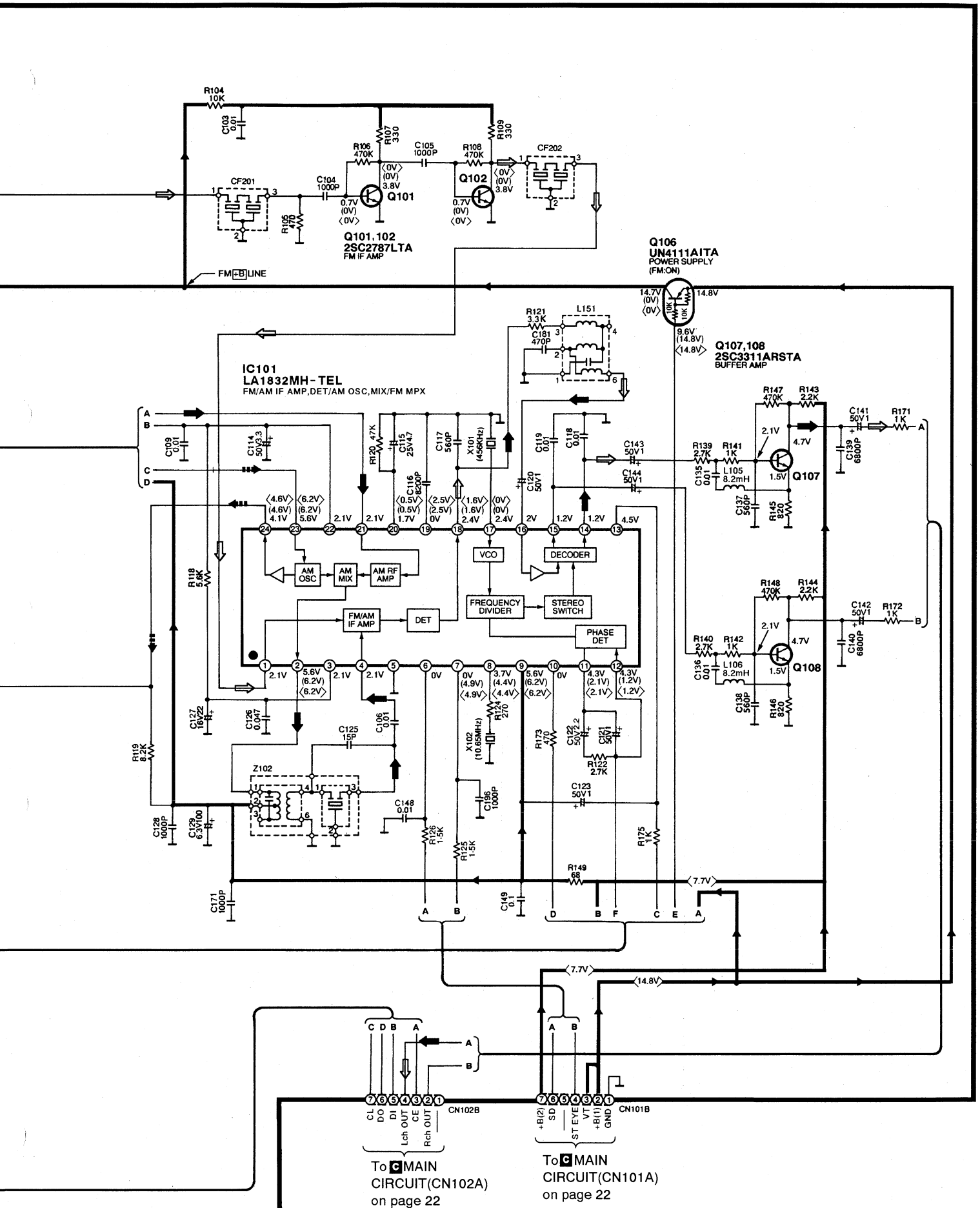

Q110
2SC3311ARSTA
BUFFER AMP
Q101,102
2SC2787LTA
FM IF AMP
Q106
UN4111AITA
POWER SUPPLY
(FM:ON)
Q107,108
2SC3311ARSTA
BUFFER AMP
IC101
LA1832MH-TEL
FM/AM IF AMP,DET/AM OSC,MIX/FM MPX
FM+B LINE
VCO
DECODER
AM OSC
AM MIX
AM RF AMP
FM/AM IF AMP
DET
FREQUENCY DIVIDER
STEREO SWITCH
PHASE DET
7.7V
14.8V
5.7V
CN102B
CN101B
CN501B
To C MAIN CIRCUIT(CN102A) on page 22
To C MAIN CIRCUIT(CN101A) on page 22
To C MAIN CIRCUIT(CN501A) on page 22

A TUNER CIRCUIT For [EG] area. (P.C.Board:on page 27)

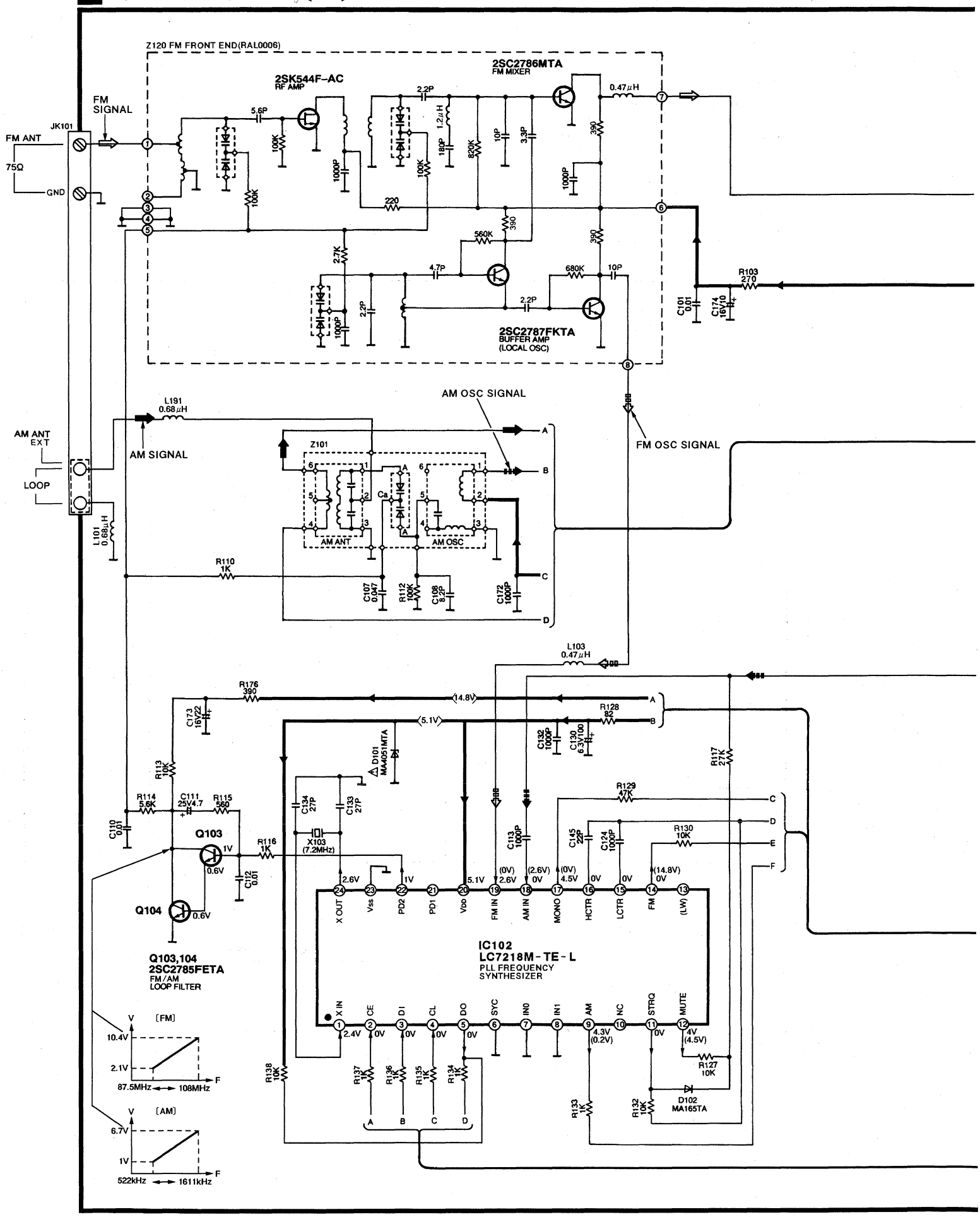


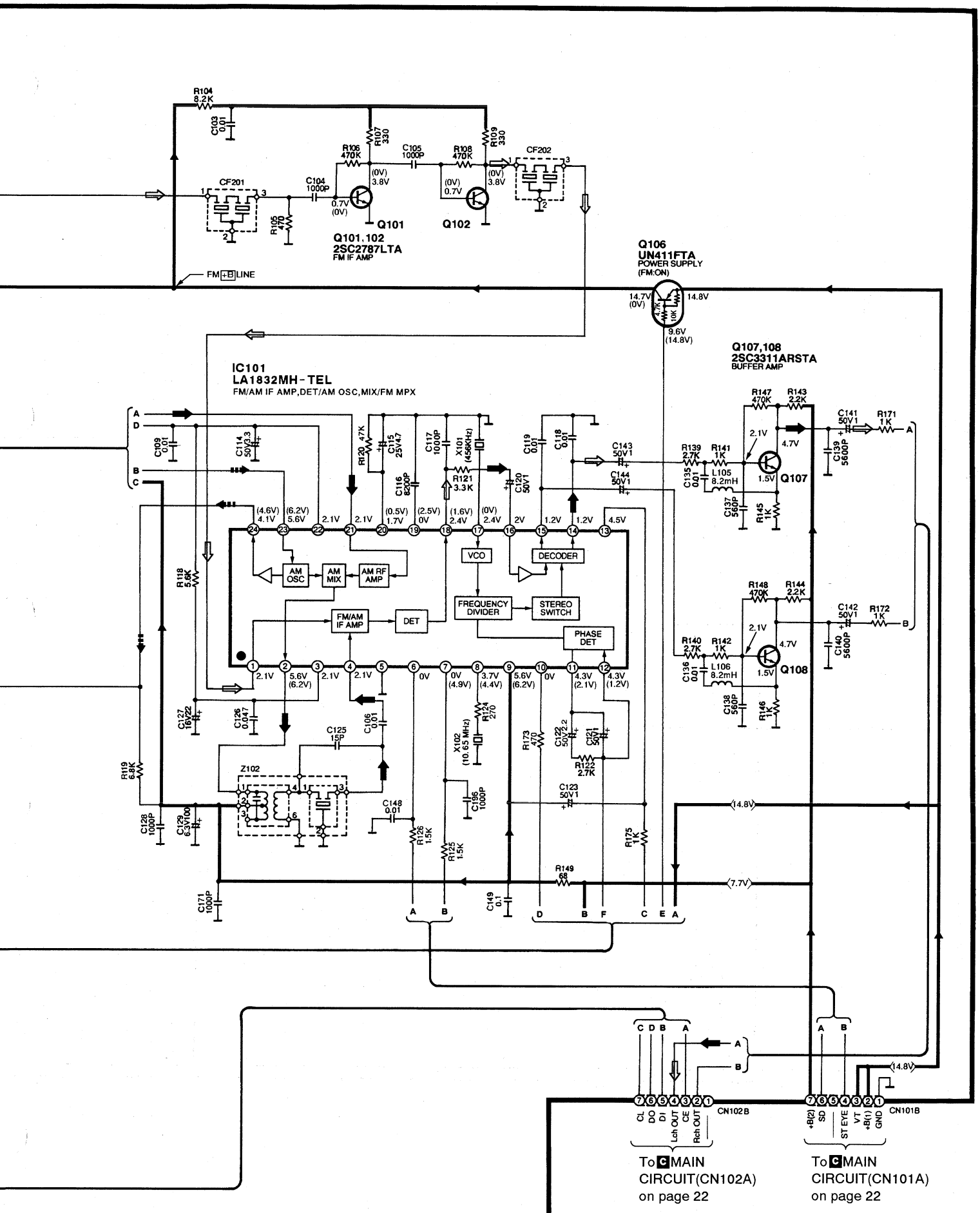
A TUNER CIRCUIT For [EB] area. (P.C. Board: on page 28)



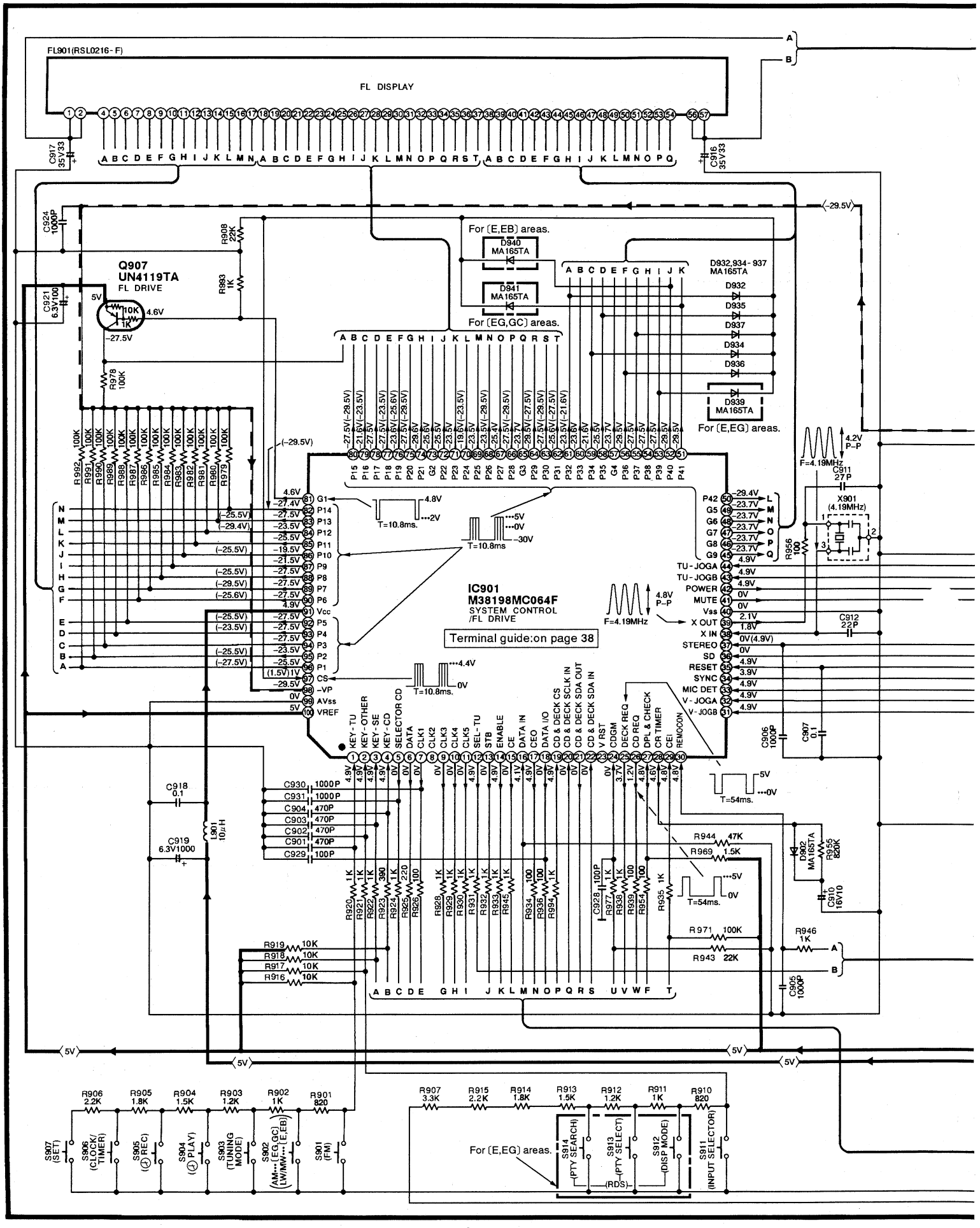

IC101
LA1832MH-TEL
FM/AM IF AMP,DET/AM OSC,MIX/FM MPX
Q101,102
2SC2787LTA
FM IF AMP
Q106
UN4111AITA
POWER SUPPLY
(FM:ON)
Q107,108
2SC3311ARSTA
BUFFER AMP
FM+B LINE
VCO
DECODER
AM OSC
AM MIX
AM RF AMP
FM/AM IF AMP
DET
FREQUENCY DIVIDER
STEREO SWITCH
PHASE DET
CN102B
CN101B
CL
DO
DI
Lch OUT
CE
Rch OUT
+B(2)
SD
ST EYE
VT
+B(1)
GND
To C MAIN CIRCUIT(CN102A) on page 22
To C MAIN CIRCUIT(CN101A) on page 22

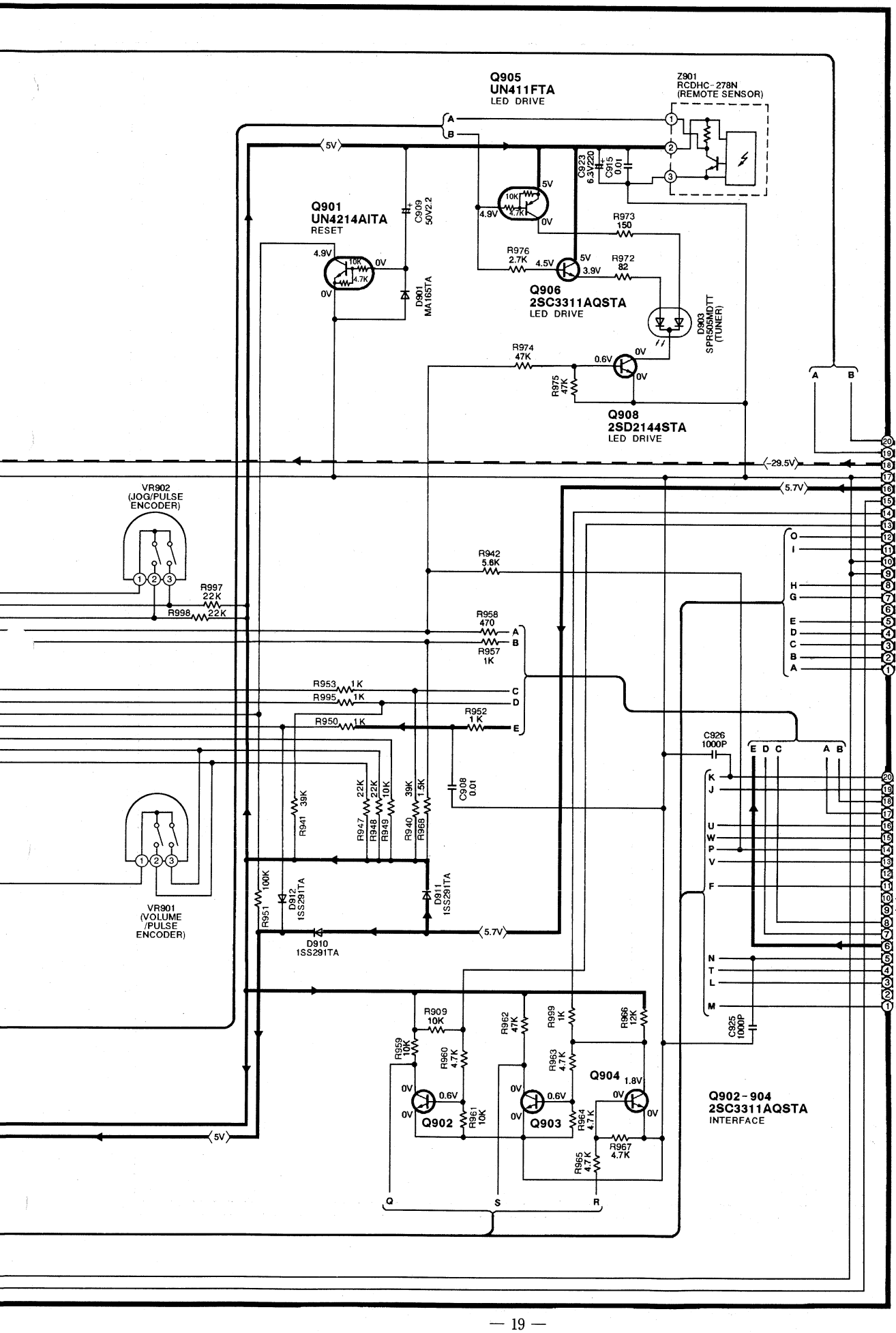
A TUNER CIRCUIT For 〔GC〕 area. (P.C. Board: on page 28)



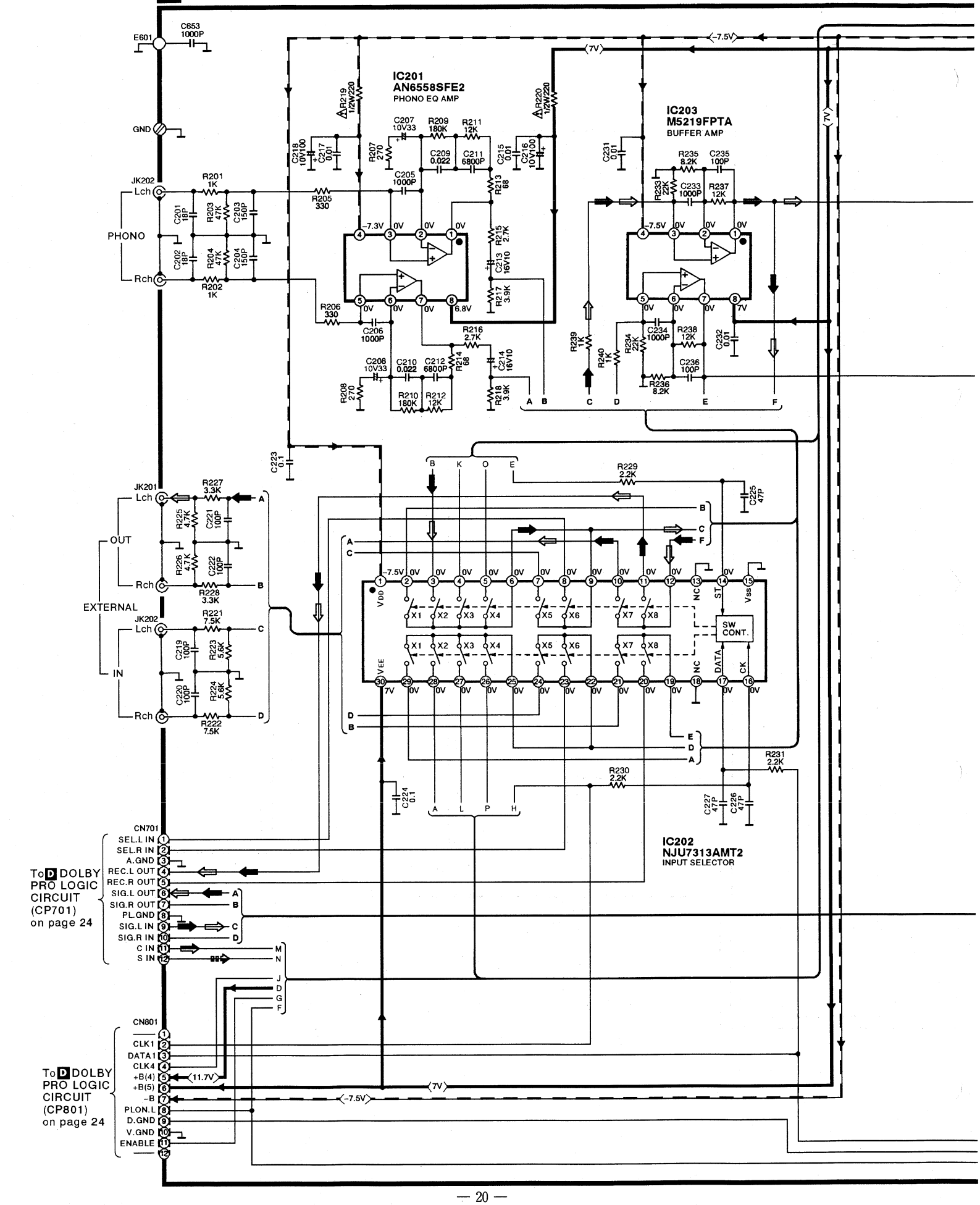

Q101
Q101,102
2SC2787LTA
FM IF AMP
Q102
Q106
UN411FTA
POWER SUPPLY
(FM:ON)
FM+B LINE
IC101
LA1832MH-TEL
FM/AM IF AMP,DET/AM OSC,MIX/FM MPX
Q107,108
2SC3311ARSTA
BUFFER AMP
Q107
Q108
AM OSC
AM MIX
AM RF AMP
VCO
DECODER
FREQUENCY DIVIDER
STEREO SWITCH
FM/AM IF AMP
DET
PHASE DET
CN102B
CN101B
CL
DO
DI
Lch OUT
CE
Rch OUT
+B(2)
SD
ST EYE
VT
+B(1)
GND
To C MAIN CIRCUIT(CN102A) on page 22
To C MAIN CIRCUIT(CN101A) on page 22

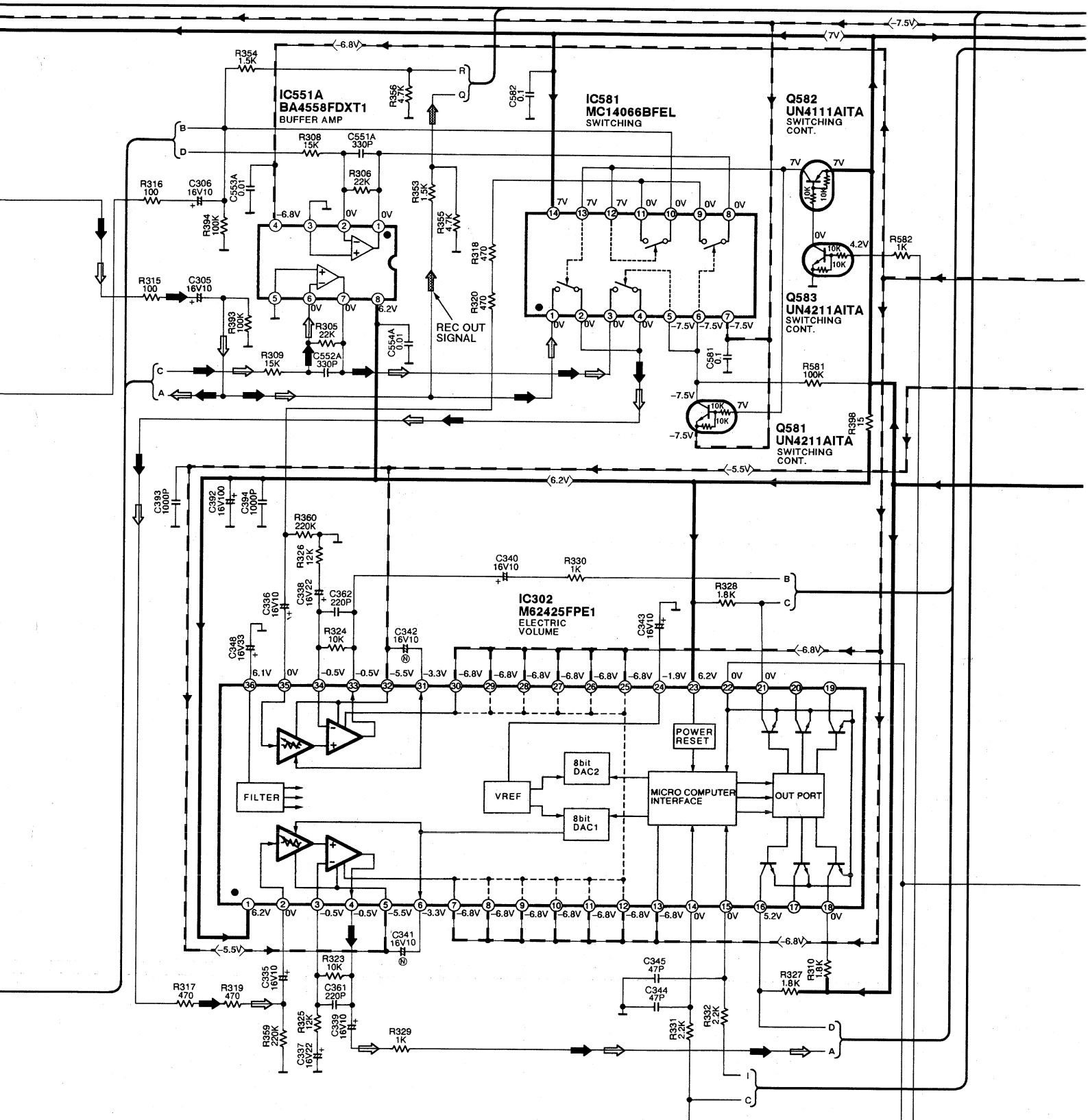
B OPERATION CIRCUIT (P.C.Board:on page 30)



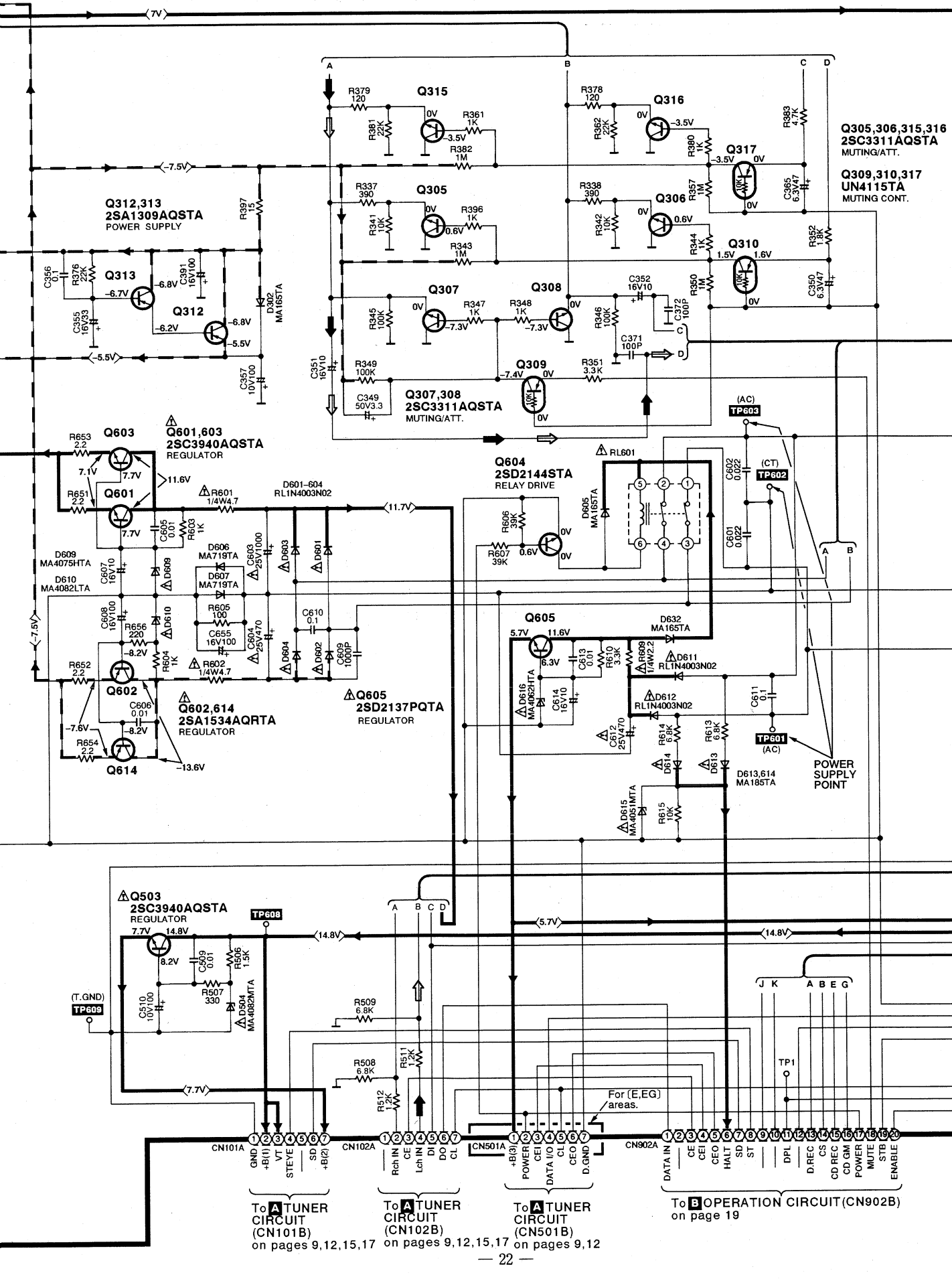

Q905
UN411FTA
LED DRIVE
Z901
RCDHC-278N
(REMOTE SENSOR)
Q901
UN4214AITA
RESET
Q906
2SC3311AQSTA
LED DRIVE
Q908
2SD2144STA
LED DRIVE
D903
SPR505MDTT
(TUNER)
D901
MA165TA
VR902
(JOG/PULSE
ENCODER)
VR901
(VOLUME
/PULSE
ENCODER)
D910
1SS291TA
D911
1SS291TA
D912
1SS291TA
Q902
Q903
Q904
Q902-904
2SC3311AQSTA
INTERFACE
CN901B
20 FL1
19 FL2
18 -VP
17 —
16 +B(3)
15 KEYCH
14 DT
13 SCLK
12 DATA I/O
11 CLK5
10 D.GND
9 VREF.G
8 CLK4
7 CLK3
6 —
5 CLK1
4 DATA
3 SEL CD
2 KEY CD
1 KEY SE
To C MAIN CIRCUIT (CN901A) on page 23
CN902B
20 ENABLE
19 STB
18 MUTE
17 POWER
16 CD GM
15 CD REC
14 CS
13 D.REC
12 —
11 DPL
10 —
9 —
8 ST
7 SD
6 HALT
5 CEO
4 CEI
3 CE
2 —
1 DATA IN
To C MAIN CIRCUIT (CN902A) on page 22
5V
-29.5V
5.7V

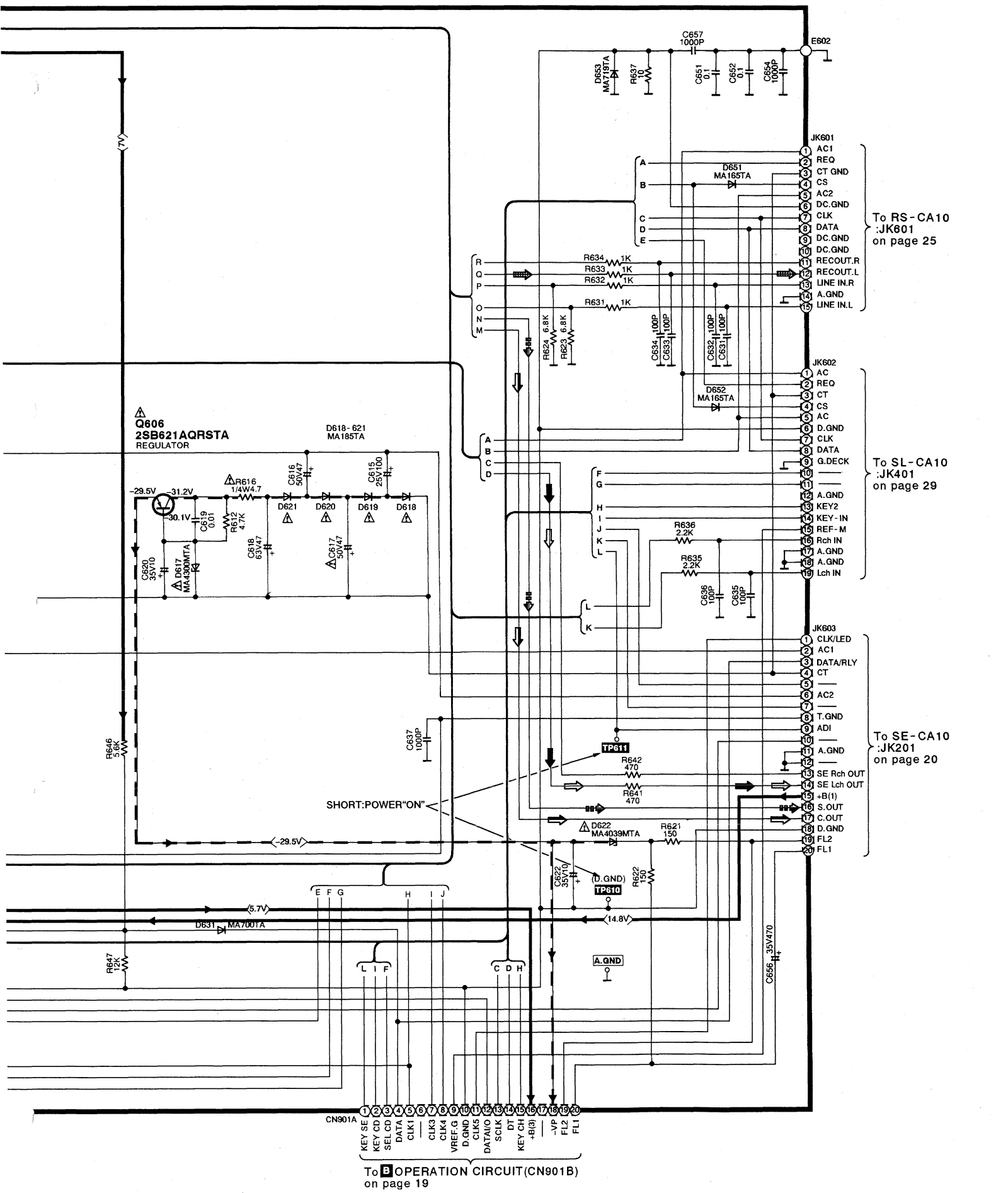
C MAIN CIRCUIT (P.C.Board:on page 29)



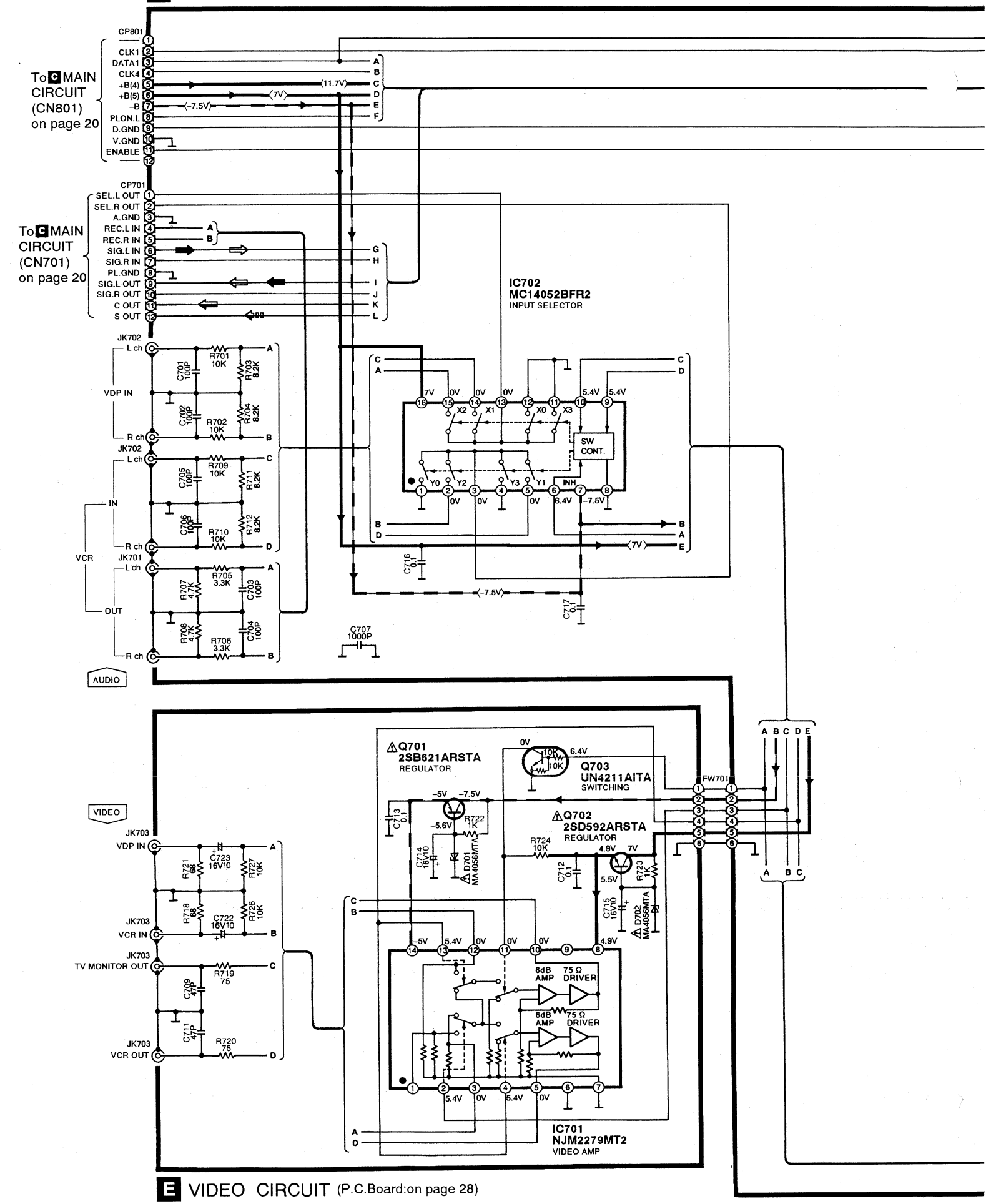

IC551A
BA4558FDXT1
BUFFER AMP
IC581
MC14066BFEL
SWITCHING
Q582
UN4111AITA
SWITCHING
CONT.
Q583
UN4211AITA
SWITCHING
CONT.
Q581
UN4211AITA
SWITCHING
CONT.
REC OUT
SIGNAL
IC302
M62425FPE1
ELECTRIC
VOLUME
POWER
RESET
8bit
DAC2
8bit
DAC1
VREF
MICRO COMPUTER
INTERFACE
OUT PORT
FILTER
-7.5V
7V
-6.8V
6.2V
-5.5V
R354 1.5K
R356 4.7K
C582 0.1
R308 15K
C551A 330P
R306 22K
R316 100
C306 16V10
C553A 0.01
R394 100K
R353 1.5K
R355 4.7K
R318 470
R320 470
R315 100
C305 16V10
R393 100K
R305 22K
C552A 330P
C554A 0.01
R309 15K
C581 0.1
R582 1K
R581 100K
R398 15
C393 1000P
C392 16V100
C394 1000P
R360 220K
R326 12K
C340 16V10
R330 1K
R328 1.8K
C336 16V10
C338 16V22
C362 220P
C348 16V33
R324 10K
C342 16V10
C343 16V10
C341 16V10
R323 10K
C361 220P
C335 16V10
R317 470
R319 470
R359 220K
R325 12K
C339 16V10
C337 16V22
R329 1K
C345 47P
C344 47P
R331 2.2K
R332 2.2K
R327 1.8K
R310 1.8K

C MAIN CIRCUIT (P.C.Board:on page 29)

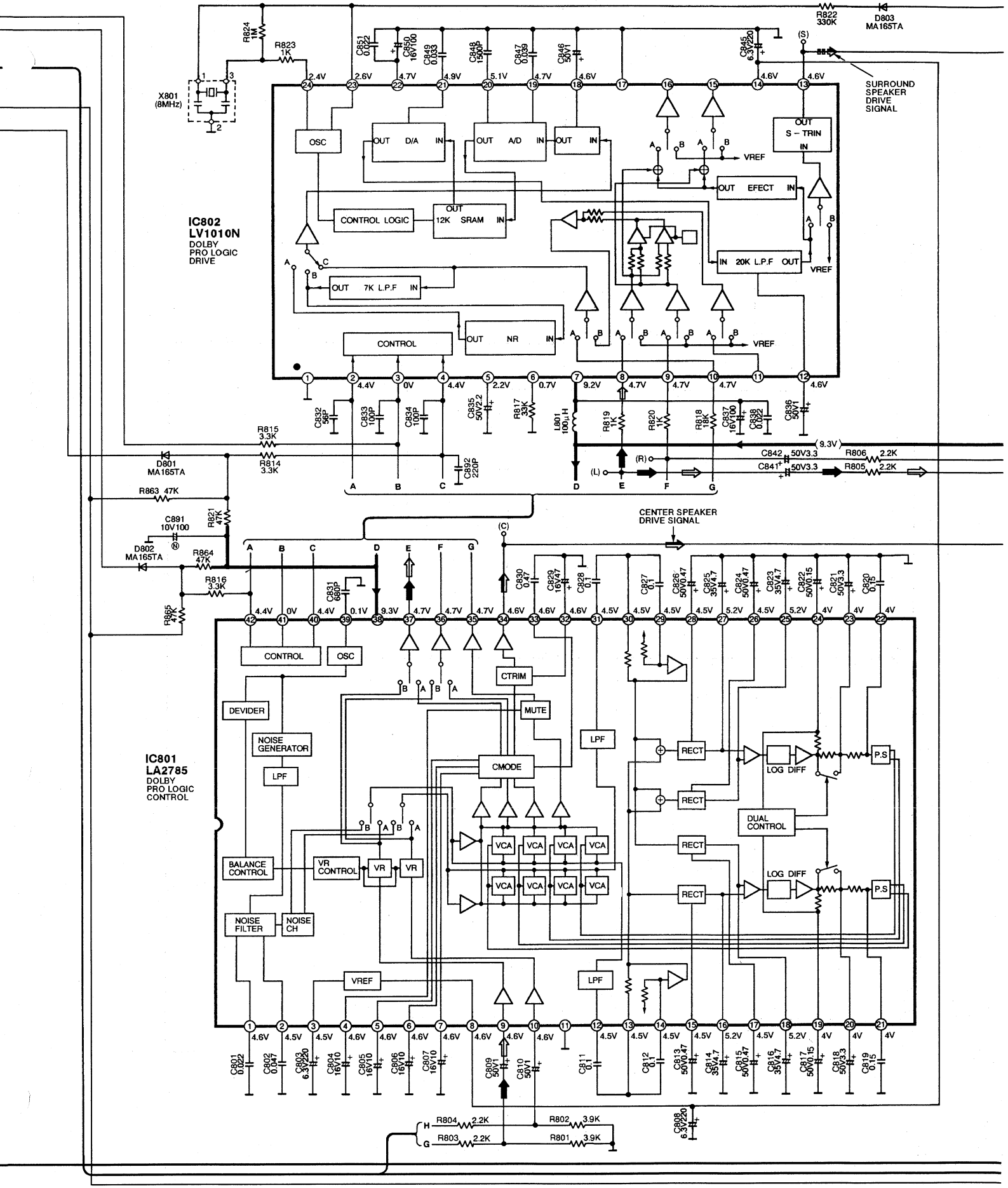



C657 1000P
E602
D653 MA719TA
R637 10
C651 0.1
C652 0.1
C654 1000P
JK601
AC1
REQ
CT GND
CS
AC2
DC.GND
CLK
DATA
DC.GND
DC.GND
RECOUT.R
RECOUT.L
LINE IN.R
A.GND
LINE IN.L
D651 MA165TA
R634 1K
R633 1K
R632 1K
R631 1K
R624 6.8K
R623 6.8K
C634 100P
C633 100P
C632 100P
C631 100P
To RS-CA10 :JK601 on page 25
JK602
AC
REQ
CT
CS
AC
D.GND
CLK
DATA
G.DECK
A.GND
KEY2
KEY-IN
REF-M
Rch IN
A.GND
A.GND
Lch IN
D652 MA165TA
R636 2.2K
R635 2.2K
C636 100P
C635 100P
To SL-CA10 :JK401 on page 29
JK603
CLK/LED
AC1
DATA/RLY
CT
AC2
T.GND
ADI
A.GND
SE Rch OUT
SE Lch OUT
+B(1)
S.OUT
C.OUT
D.GND
FL2
FL1
To SE-CA10 :JK201 on page 20
Q606
2SB621AQRSTA
REGULATOR
D618-621 MA185TA
-29.5V
-31.2V
-30.1V
R616 1/4W4.7
C616 50V47
C615 25V100
D621
D620
D619
D618
C619 0.01
R612 4.7K
C618 63V47
C617 50V47
C620 35V10
D617 MA4300MTA
R646 5.6K
C637 1000P
TP611
R642 470
R641 470
SHORT:POWER"ON"
-29.5V
D622 MA4039MTA
R621 150
C622 35V10
(D.GND)
TP610
R622 150
5.7V
14.8V
D631 MA7001A
R647 12K
A.GND
C656 35V470
CN901A
KEY SE
KEY CD
SEL CD
DATA
CLK1
CLK3
CLK4
VREF.G
D.GND
CLK5
DATA1/O
SCLK
DT
KEY CH
+B(3)
-VP
FL2
FL1
To B OPERATION CIRCUIT(CN901B) on page 19

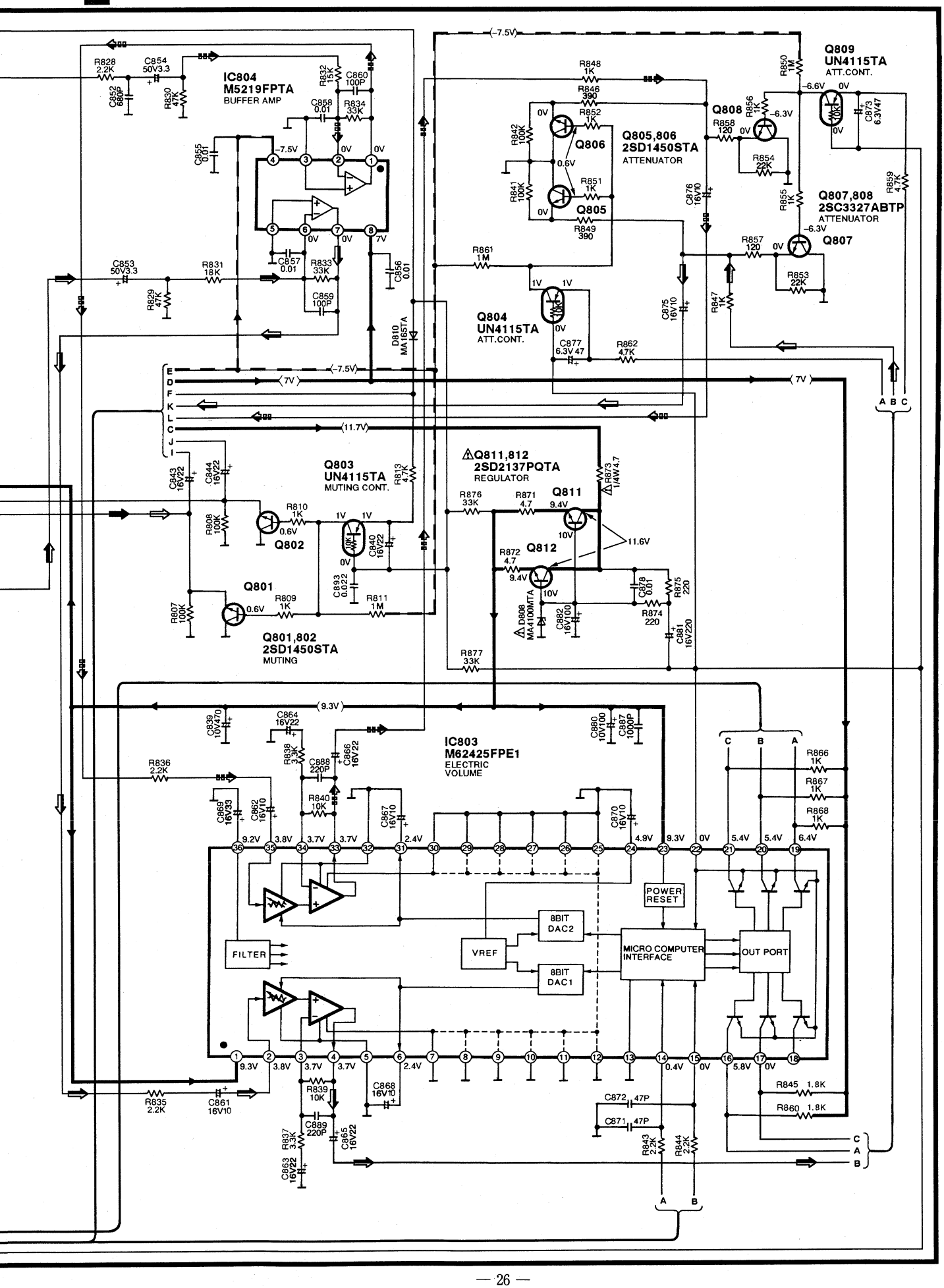
D DOLBY PRO LOGIC CIRCUIT (P.C.Board:on page 30)



E VIDEO CIRCUIT (P.C.Board:on page 28)


IC802
LV1010N
DOLBY
PRO LOGIC
DRIVE
IC801
LA2785
DOLBY
PRO LOGIC
CONTROL
X801
(8MHz)
OSC
CONTROL LOGIC
OUT 12K SRAM IN
OUT D/A IN
OUT A/D IN
OUT IN
OUT S – TRIN IN
OUT EFECT IN
IN 20K L.P.F OUT
OUT 7K L.P.F IN
CONTROL
OUT NR IN
VREF
SURROUND SPEAKER DRIVE SIGNAL
CENTER SPEAKER DRIVE SIGNAL
D801 MA165TA
D802 MA165TA
D803 MA165TA
R822 330K
R824 1M
R823 1K
R815 3.3K
R814 3.3K
R816 3.3K
R863 47K
R821 47K
R864 47K
R865 47K
C891 10V100
C892 220P
C842 50V3.3
C841 50V3.3
R806 2.2K
R805 2.2K
9.3V
(R)
(L)
(S)
(C)
DEVIDER
NOISE GENERATOR
LPF
CMODE
MUTE
CTRIM
VCA
RECT
LOG DIFF
P.S
DUAL CONTROL
BALANCE CONTROL
VR CONTROL
VR
NOISE FILTER
NOISE CH
R804 2.2K
R803 2.2K
R802 3.9K
R801 3.9K

D DOLBY PRO LOGIC CIRCUIT (P.C.Board:on page 30)

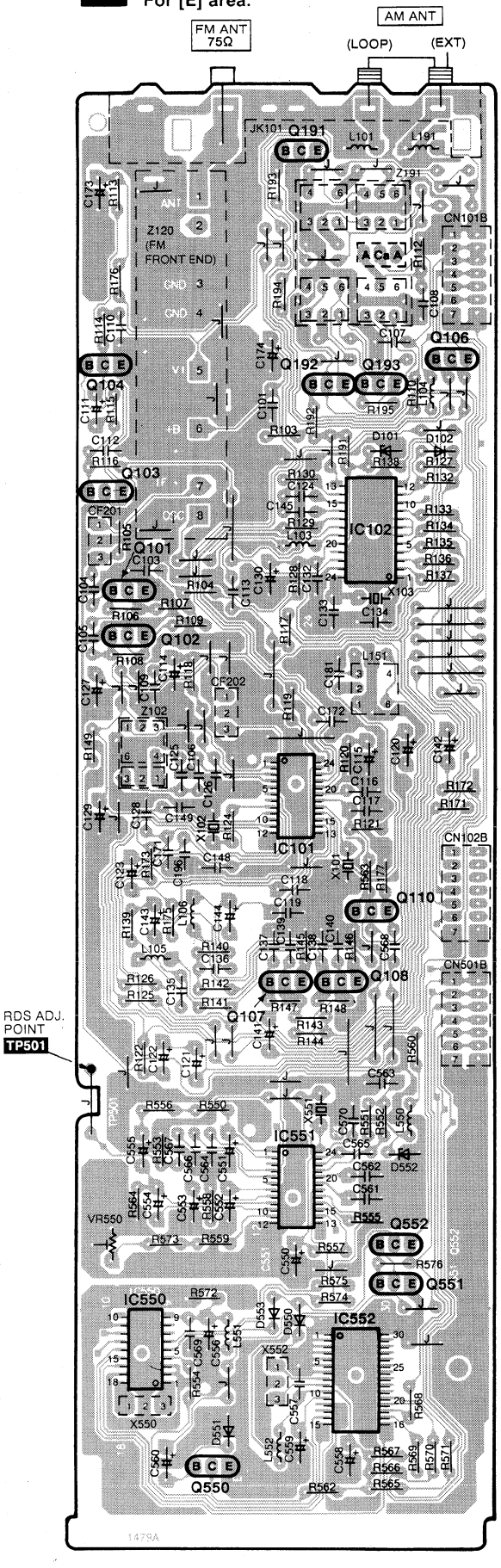


■ PRINTED CIRCUIT BOARD DIAGRAM

- This circuit board diagram may be modified at any time with the development of new technology.

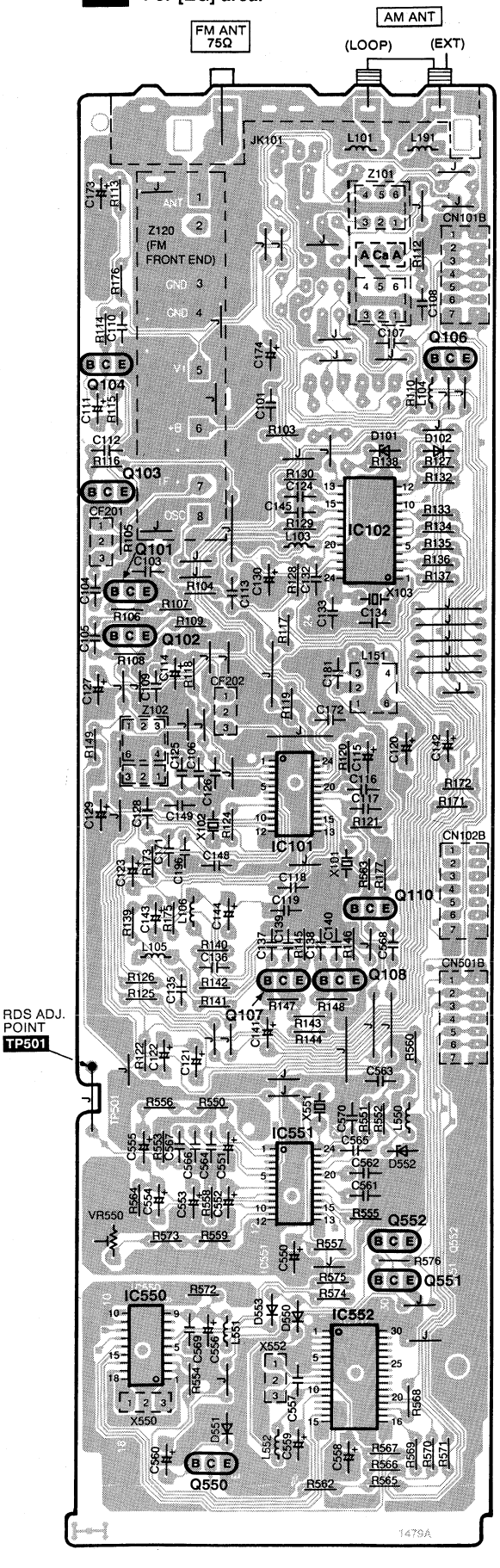
A TUNER P.C.B. (REP2151B–T)

For [E] area.



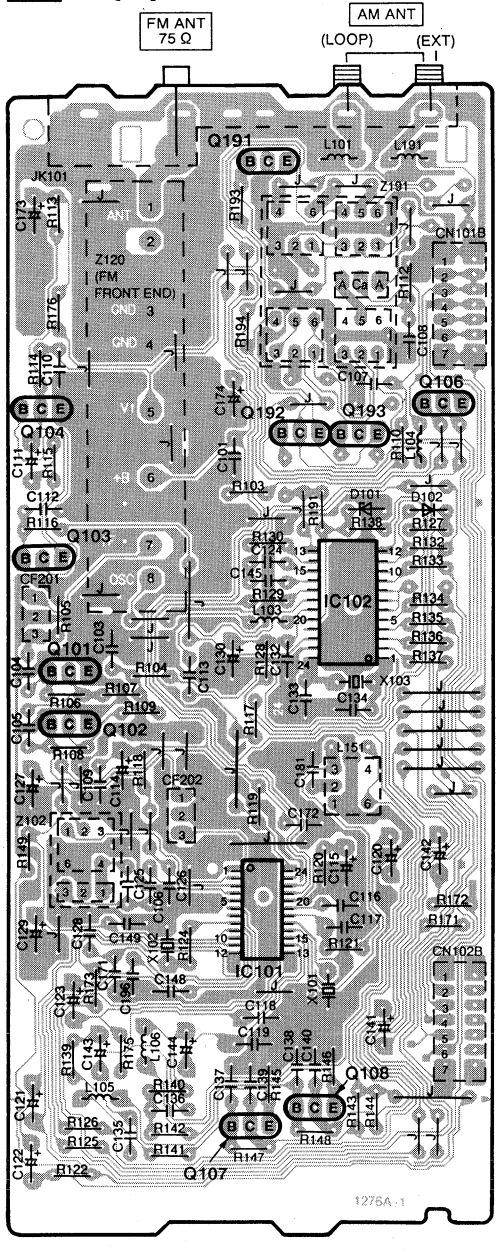
A TUNER P.C.B. (REP2151A–T)

For [EG] area.



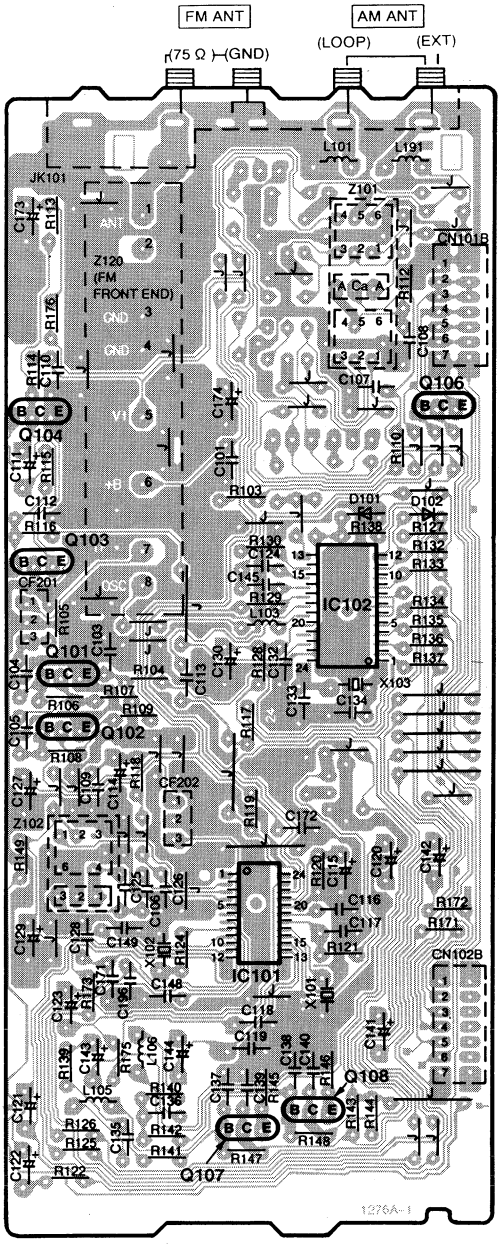
A TUNER P.C.B. (REP1930F–T)

For [EB] area.

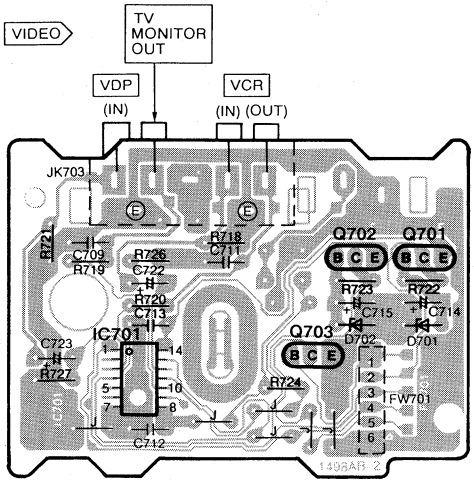


A TUNER P.C.B. (REP1930E–T)

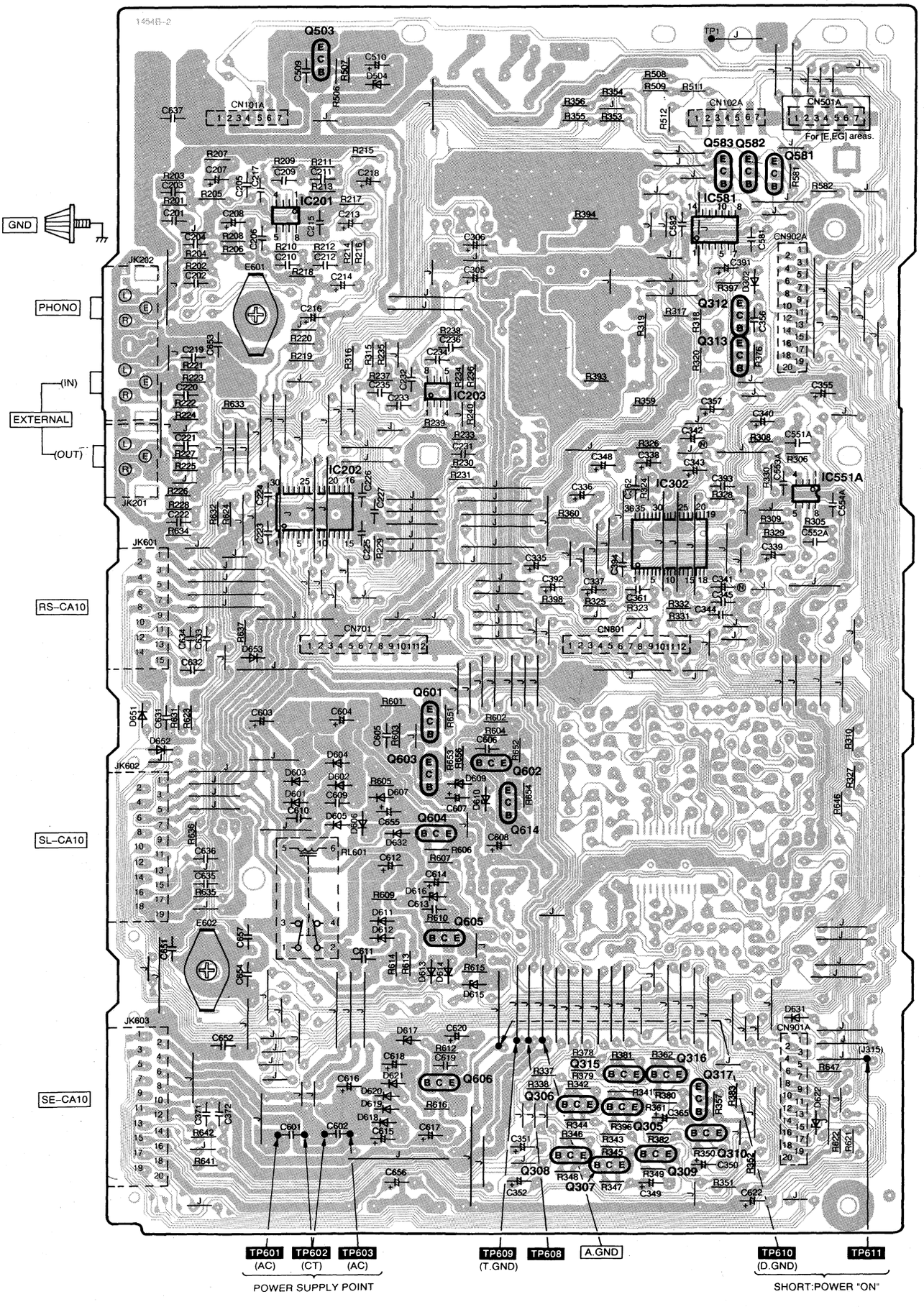
For [GC] area.



E VIDEO P.C.B. (REP2172A–T)

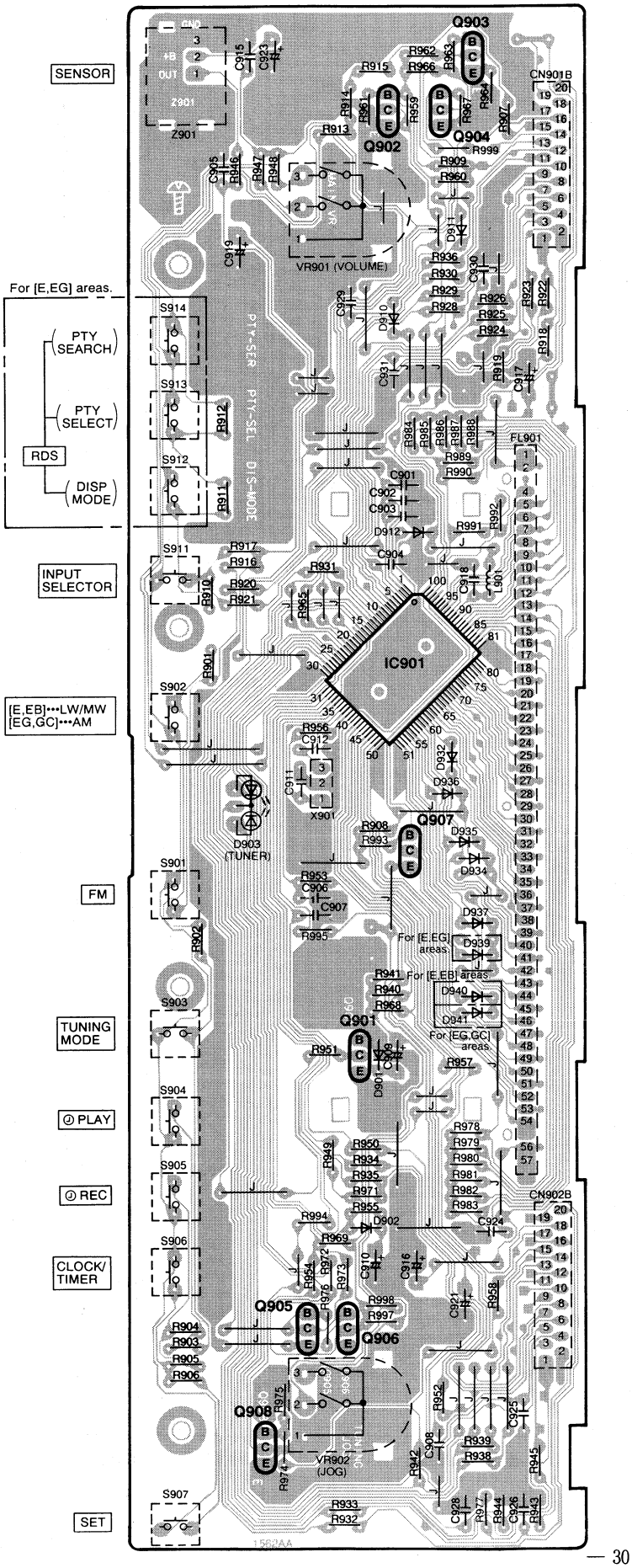


C MAIN P.C.B. (REP2289C–M•••[E,EG] REP2289D–M•••[EB,GC])

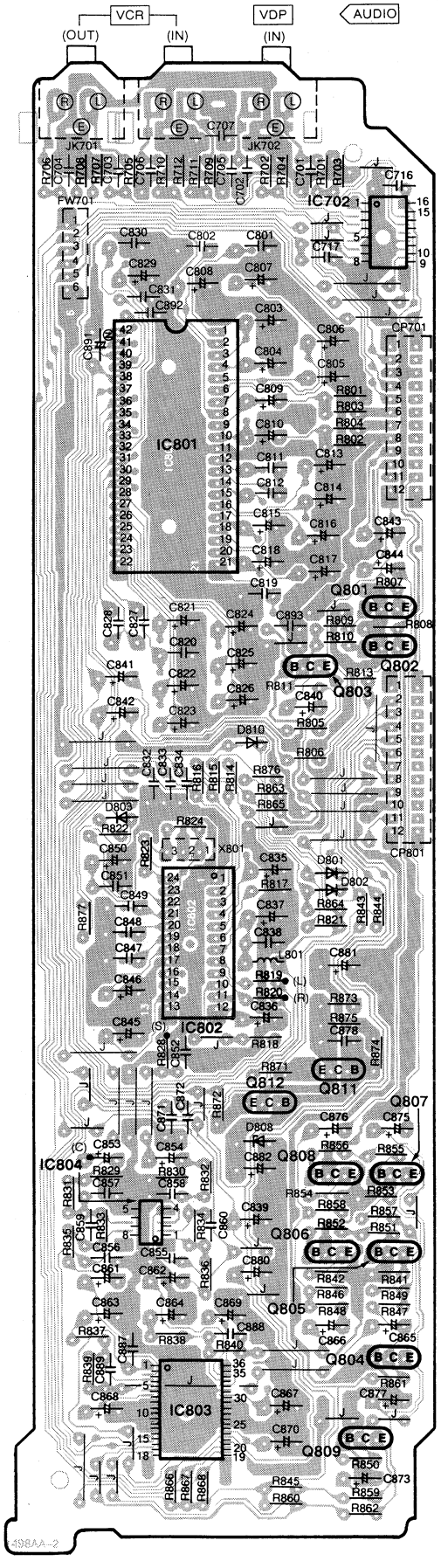


B OPERATION P.C.B.

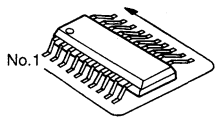
REP2290D–S•••[E]
REP2290E–S•••[EG]
REP2290F–S•••[GC]
REP2290J–S•••[EB]



D DOLBY PRO LOGIC P.C.B. (REP2172A–T)

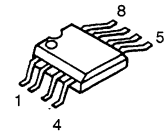


● Terminal guide of IC's transistors and diodes

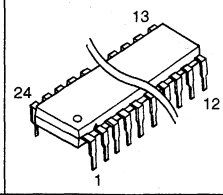


AN6558SFE2	8PIN	LA2230M-TE-L	24PIN
M5219FPTA	8PIN	LC7218M-TE-L	24PIN
MC14066BFEL	14PIN	LC65104A4F75	30PIN
MC14052BFR2	16PIN	NJU7313AMT2	30PIN
NJM2279MT2	16PIN	M62425FPE1	36PIN
LC7073M-TLM	18PIN		
LA1832MH-TEL	24PIN		

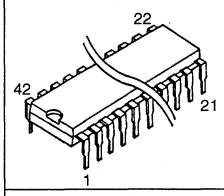
BA4558FDXT1



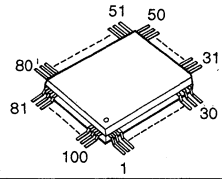
LV1010N

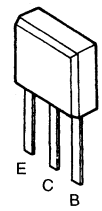


LA2785



M38198MC064F

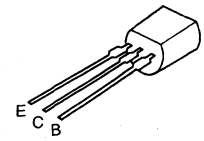




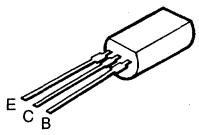
2SA1309AQSTA
2SC2785FETA
2SC2787LTA
2SC3311AQSTA
2SC3311ARSTA
2SD1450STA
UN411FTA
UN4111AITA

UN4115TA
UN4119TA
UN4211AITA
UN4214AITA

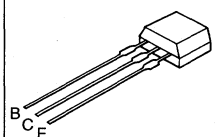
2SB621AQRSTA
2SB621ARSTA
2SD592ARSTA



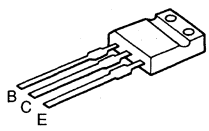
2SA1534AQRTA
2SC3940AQSTA



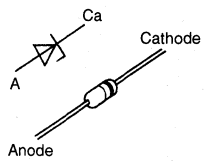
2SD2144STA
2SC3327ABTP

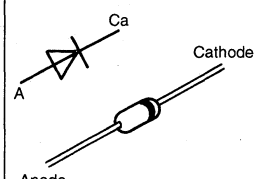


2SD2137PQTA



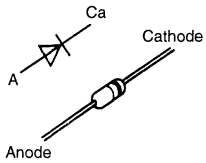
MA4100MTA
MA4300MTA

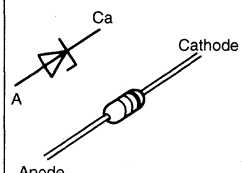




1SS291TA
MA165TA
MA700TA

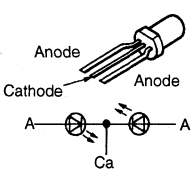
MA185TA
MA719TA



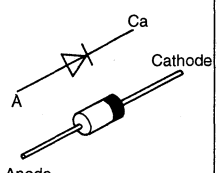


MA4039MTA
MA4051MTA
MA4056MTA
MA4062HTA
MA4075HTA
MA4082LTA
MA4082MTA

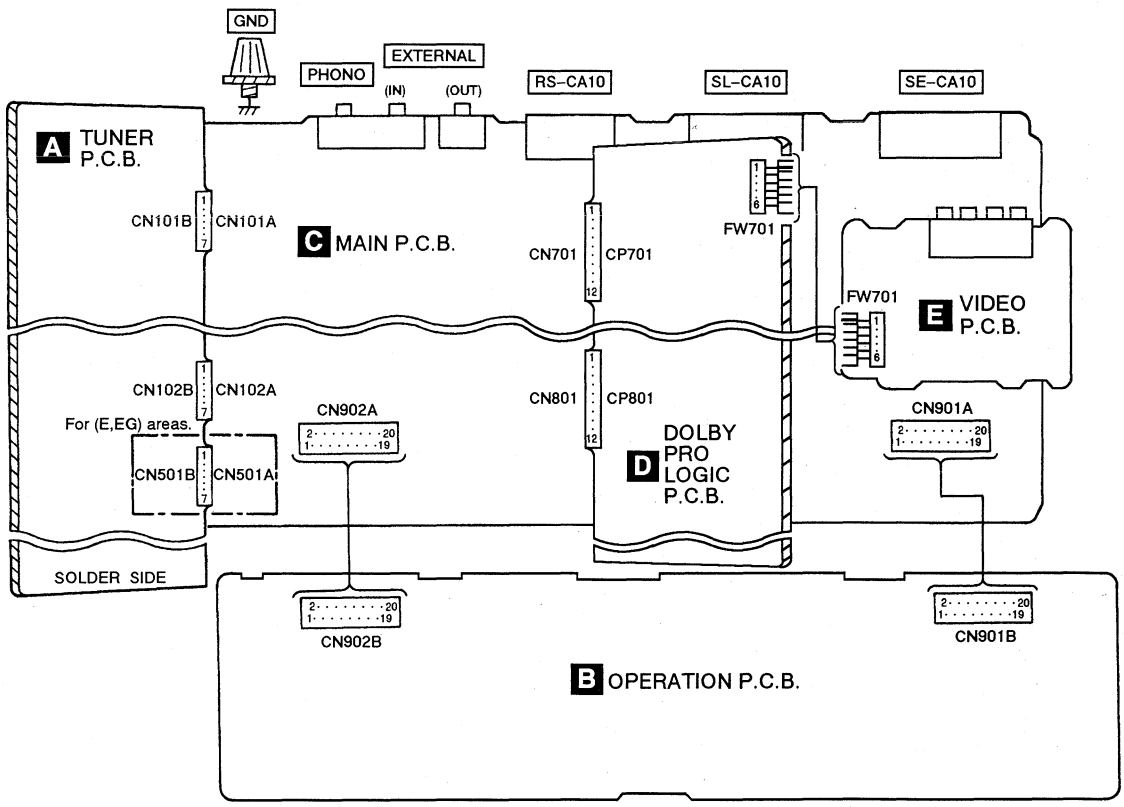
SPR505MDTT



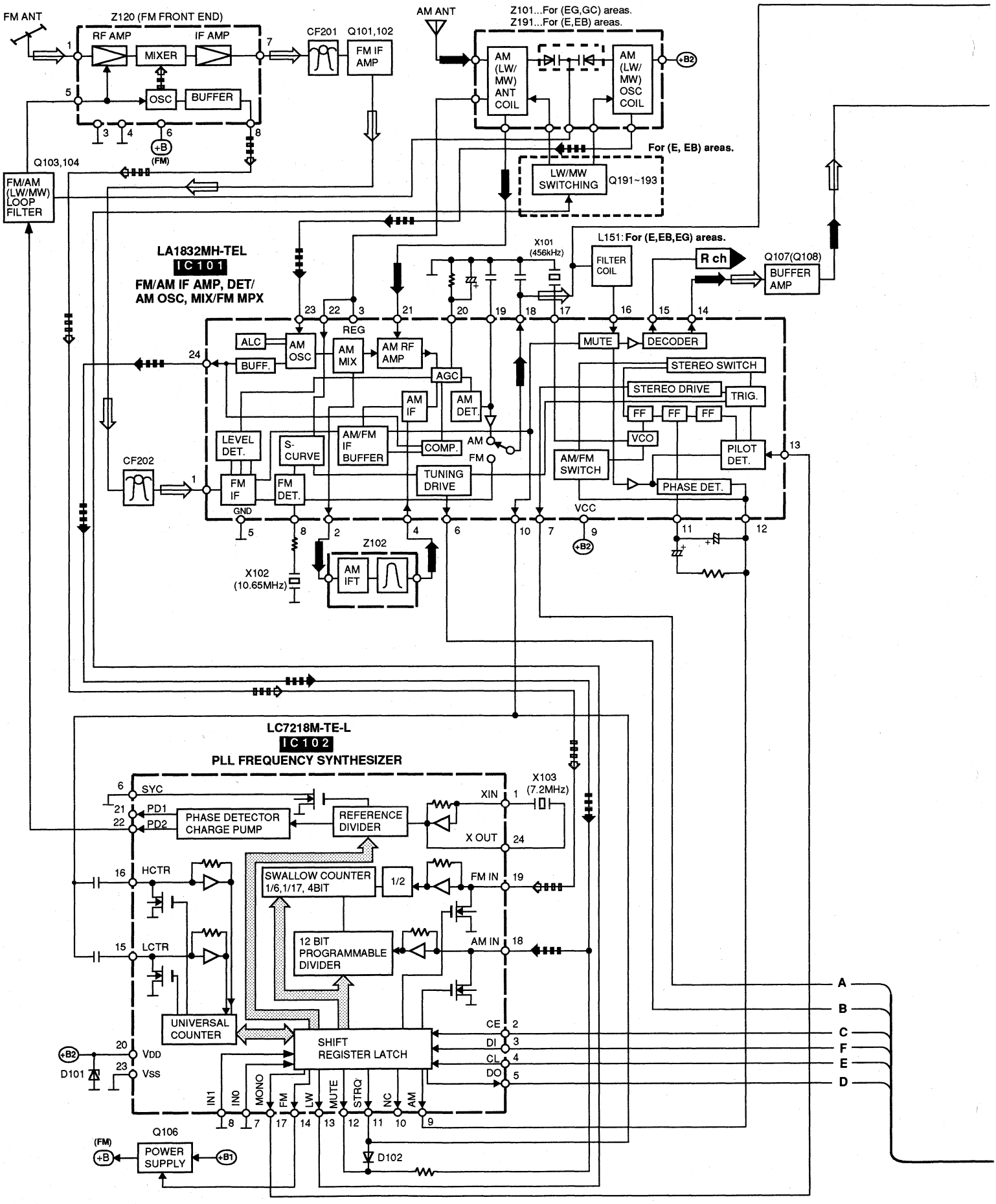
RL1N4003N02



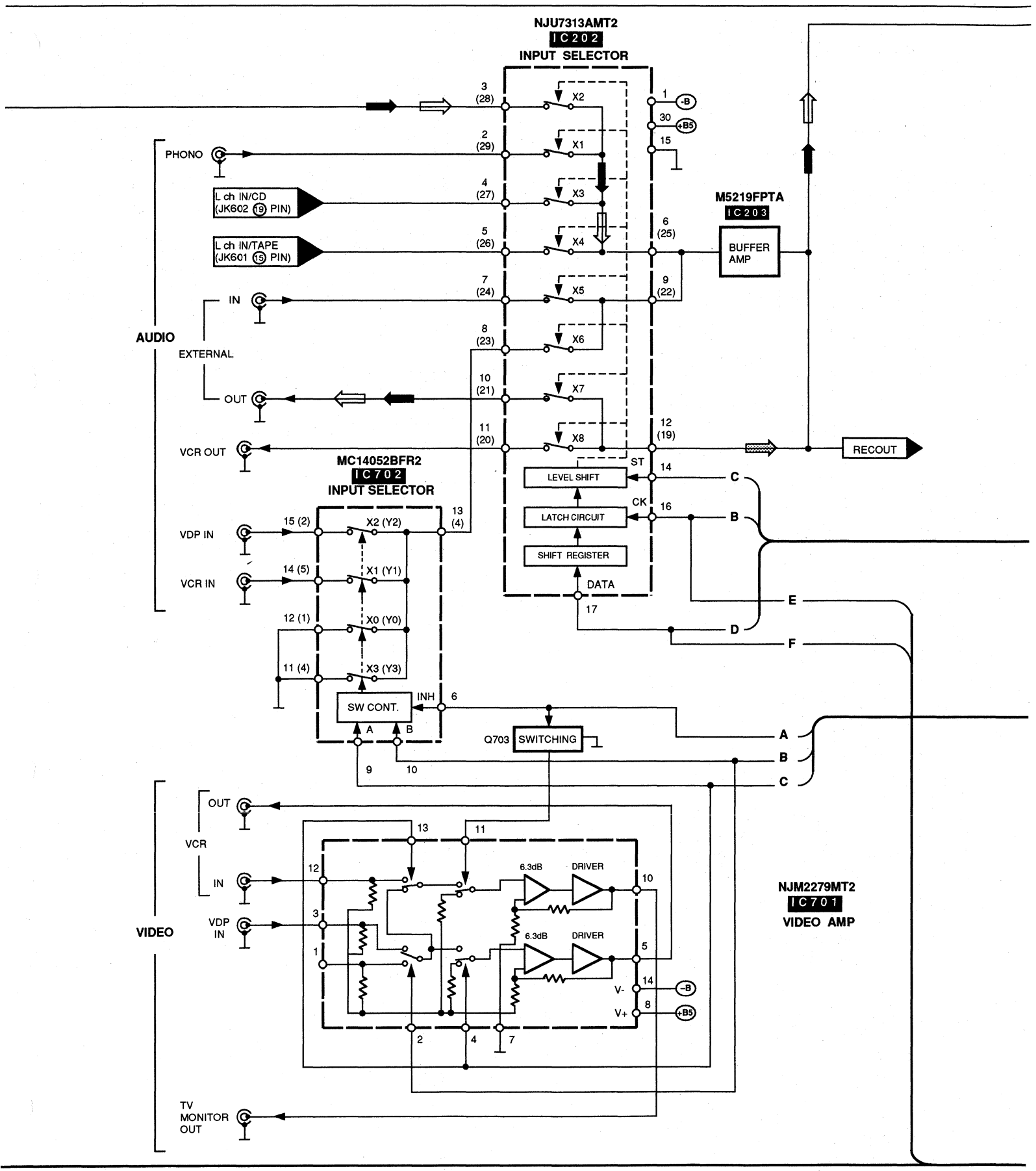
■ WIRING CONNECTION DIAGRAM



■ BLOCK DIAGRAM

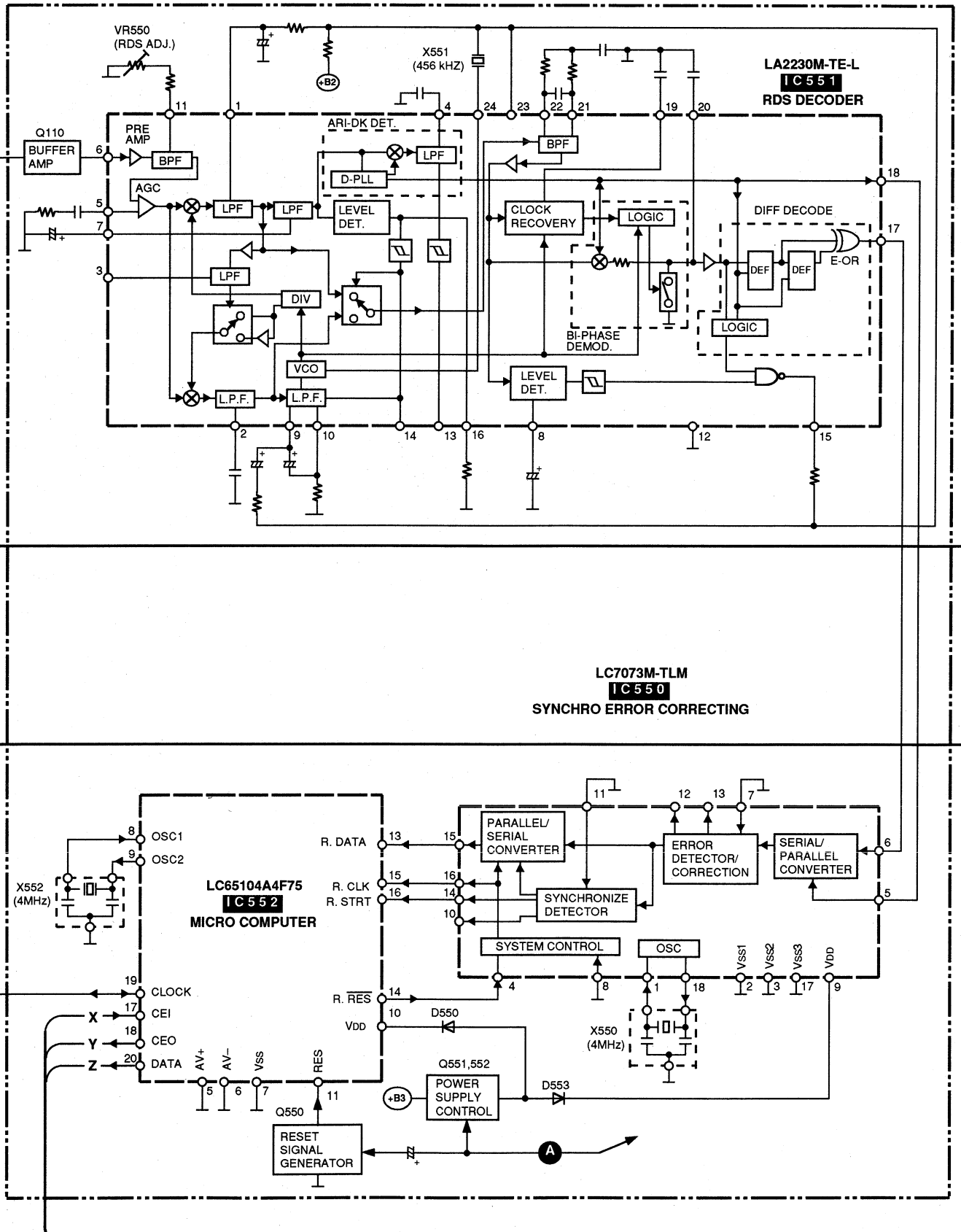


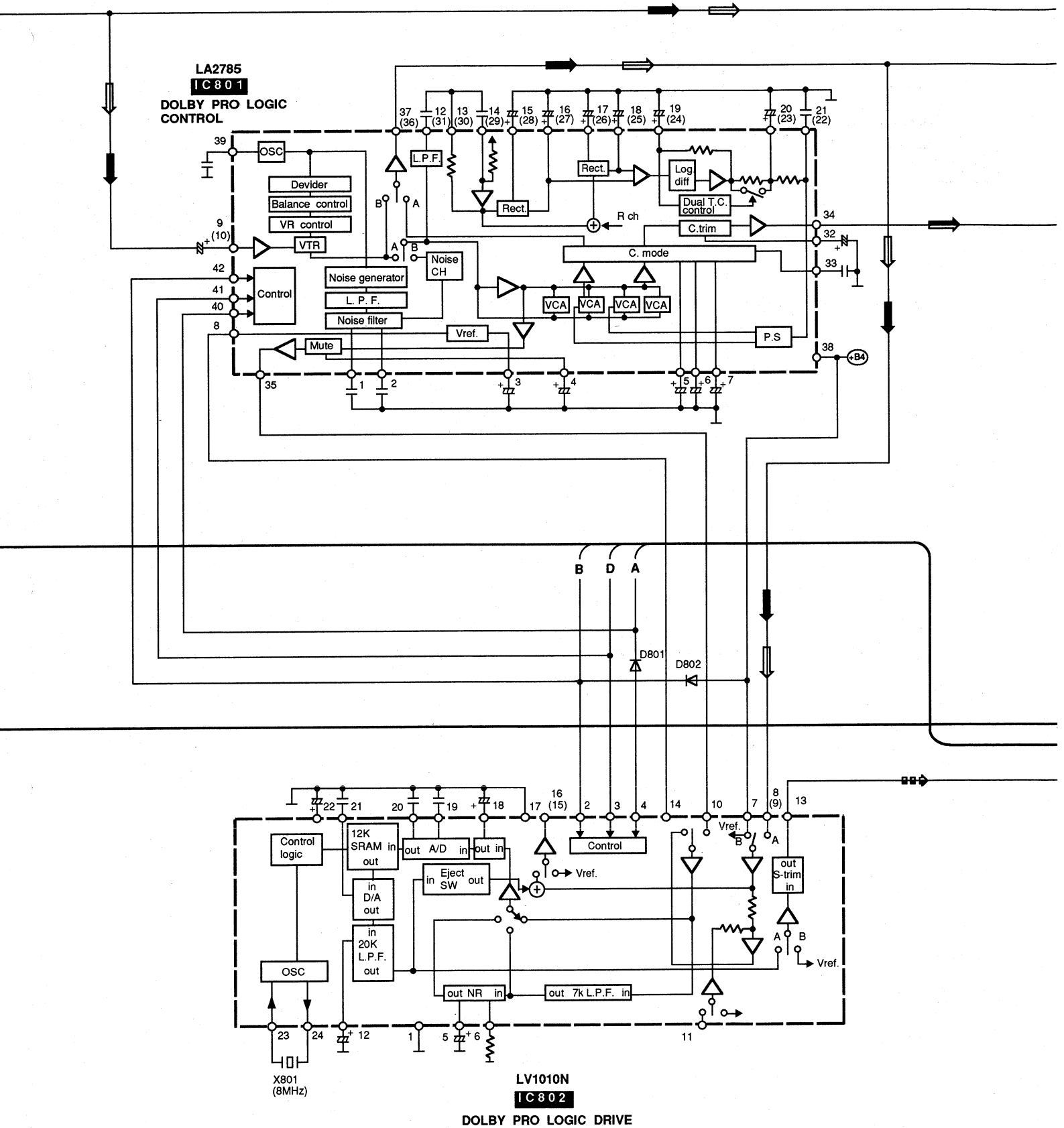
● Signal line : FM signal : FM OSC signal : AM signal : AM OSC signal
: Rec out signal : Center speaker drive signal : Sourround speaker drive signal

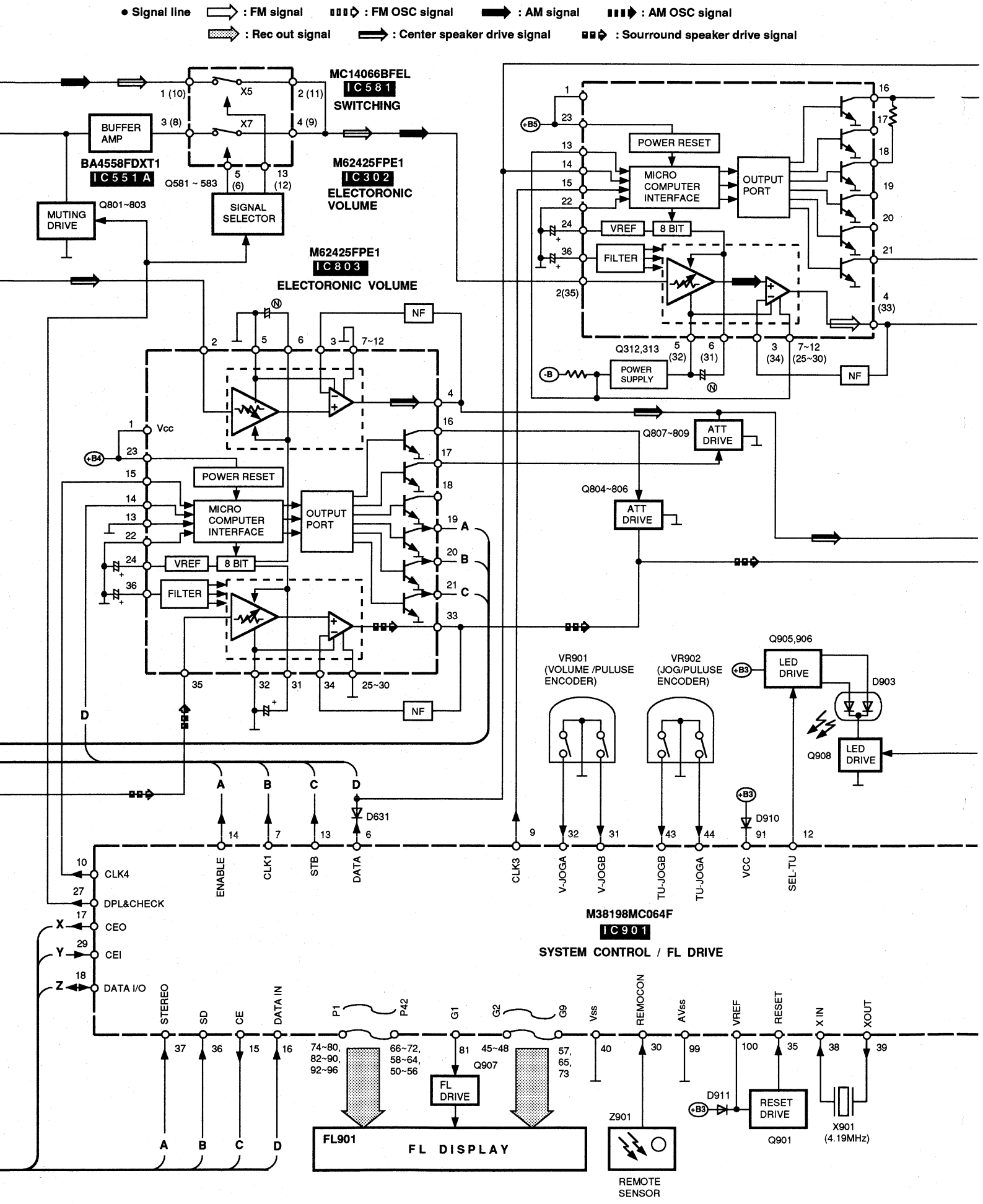


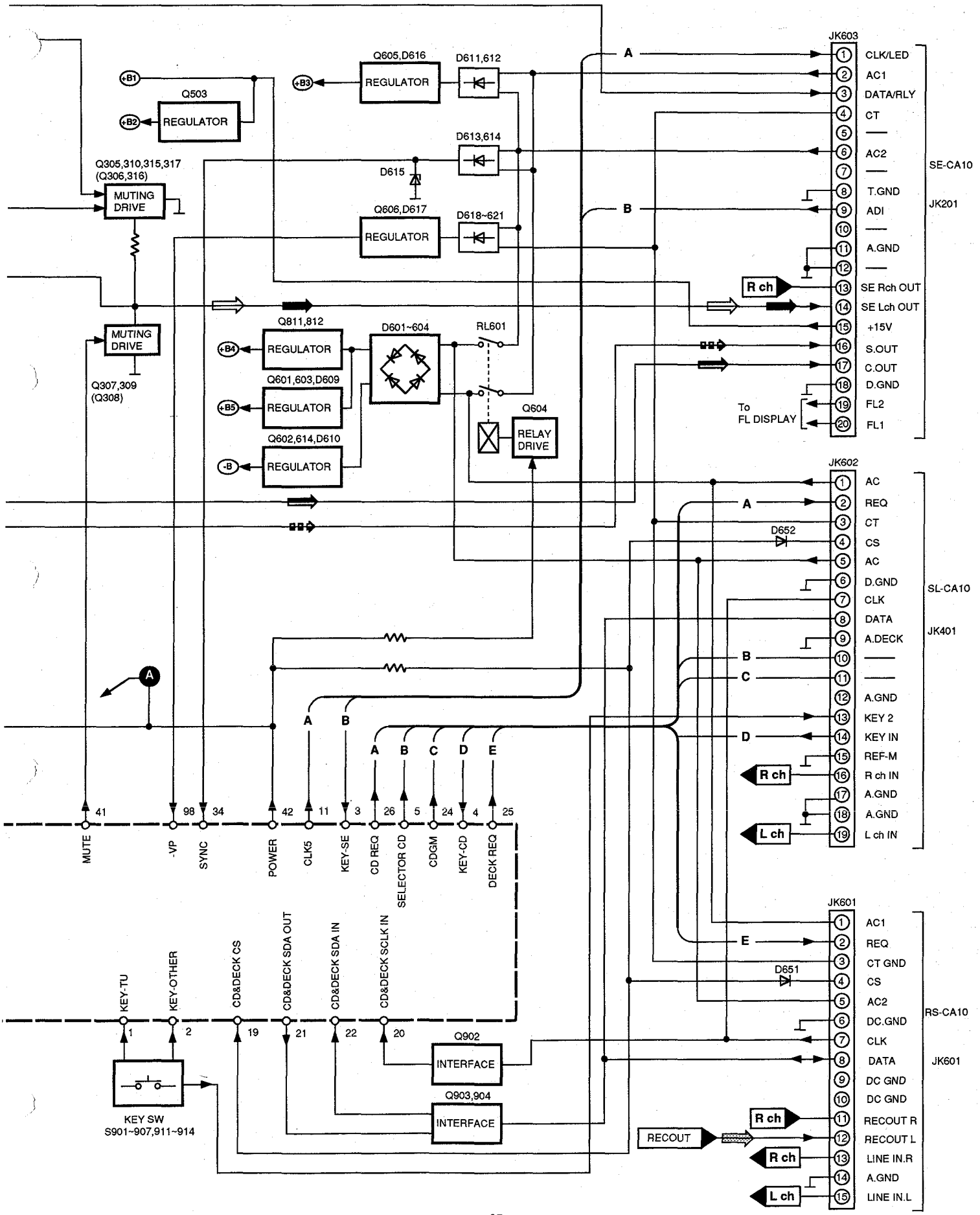
● Signal line : FM signal : FM OSC signal : AM signal : AM OSC signal
: Rec out signal : Center speaker drive signal : Sourround speaker drive signal

For (E, EG) areas.




LA2785
IC801
DOLBY PRO LOGIC
CONTROL
OSC
Devider
Balance control
VR control
VTR
Control
Noise generator
L. P. F.
Noise filter
Noise CH
L.P.F.
Rect.
Rect.
Log diff
Dual T.C. control
R ch
C.trim
C. mode
VCA
VCA
VCA
VCA
Vref.
Mute
P.S
+B4
B
D
A
D801
D802
LV1010N
IC802
DOLBY PRO LOGIC DRIVE
Control logic
12K SRAM in out
out A/D in
out in
in D/A out
in 20K L.P.F. out
in Eject SW out
Control
Vref.
out S-trim in
OSC
out NR in
out 7k L.P.F. in
X801
(8MHz)


• Signal line : FM signal : FM OSC signal : AM signal : AM OSC signal
: Rec out signal : Center speaker drive signal : Sourround speaker drive signal
MC14066BFEL
IC581
SWITCHING
BUFFER AMP
BA4558FDXT1
IC551A
Q581 ~ 583
MUTING DRIVE
Q801~803
SIGNAL SELECTOR
M62425FPE1
IC302
ELECTORONIC VOLUME
M62425FPE1
IC803
ELECTORONIC VOLUME
POWER RESET
MICRO COMPUTER INTERFACE
OUTPUT PORT
VREF
8 BIT
FILTER
NF
Vcc
Q312,313
POWER SUPPLY
Q807~809
ATT DRIVE
Q804~806
ATT DRIVE
VR901 (VOLUME /PULUSE ENCODER)
VR902 (JOG/PULUSE ENCODER)
Q905,906
LED DRIVE
D903
Q908
LED DRIVE
D631
D910
M38198MC064F
IC901
SYSTEM CONTROL / FL DRIVE
CLK4
DPL&CHECK
CEO
CEI
DATA I/O
ENABLE
CLK1
STB
DATA
CLK3
V-JOGA
V-JOGB
TU-JOGB
TU-JOGA
VCC
SEL-TU
STEREO
SD
CE
DATA IN
P1
P42
G1
G2
G9
Vss
REMOCON
AVss
VREF
RESET
X IN
XOUT
Q907
FL DRIVE
FL901
FL DISPLAY
Z901
REMOTE SENSOR
D911
RESET DRIVE
Q901
X901 (4.19MHz)


+B1
Q503
REGULATOR
+B2
Q305,310,315,317
(Q306,316)
MUTING DRIVE
Q307,309
(Q308)
+B3
Q605,D616
REGULATOR
D611,612
D613,614
D615
Q606,D617
REGULATOR
D618~621
Q811,812
+B4
REGULATOR
D601~604
RL601
Q601,603,D609
+B5
REGULATOR
Q602,614,D610
-B
REGULATOR
Q604
RELAY DRIVE
JK603
A
B
CLK/LED
AC1
DATA/RLY
CT
AC2
T.GND
ADI
A.GND
R ch
SE Rch OUT
SE Lch OUT
+15V
S.OUT
C.OUT
D.GND
To FL DISPLAY
FL2
FL1
SE-CA10
JK201
JK602
AC
REQ
CT
D652
CS
AC
D.GND
CLK
DATA
A.DECK
B
C
A.GND
KEY 2
D
KEY IN
REF-M
R ch
R ch IN
A.GND
A.GND
L ch
L ch IN
SL-CA10
JK401
A
B
A B C D E
41 98 34 42 11 3 26 5 24 4 25
MUTE -VP SYNC POWER CLK5 KEY-SE CD REQ SELECTOR CD CDGM KEY-CD DECK REQ
KEY-TU KEY-OTHER CD&DECK CS CD&DECK SDA OUT CD&DECK SDA IN CD&DECK SCLK IN
1 2 19 21 22 20
Q902
INTERFACE
Q903,904
INTERFACE
KEY SW
S901~907,911~914
JK601
AC1
E
REQ
CT GND
D651
CS
AC2
DC.GND
CLK
DATA
DC GND
DC GND
R ch
RECOUT R
RECOUT
RECOUT L
R ch
LINE IN.R
A.GND
L ch
LINE IN.L
RS-CA10
JK601

■ TERMINAL GUIDE

● IC901 (M38198MC064F): SYSTEM CONTROL/ FL DRIVE

Pin No.	Mark	I/O	Function
1	KEY-TU	I	Tuner operation switch signal input
2	KEY-OTHER	I	Other operation switch signal input
3	KEY-SE	I	SE-CA10 operation switch signal input
4	KEY-CD	I	SL-CA10 operation switch signal input
5	SELECTOR CD	O	SL-CA10 power control signal output
6	DATA	O	Data output for NJU7313, M62425, LC7218, LA2785, and LV1010
7	CLK1	O	Clock output for NJU7313, LC7218, LA2785, LV1010 and LC65104
8	CLK2	O	Clock output (Not used, open)
9	CLK3	O	Clock output for M62425 (Main volume)
10	CLK4	O	Clock output for M62425 (Surround volume)
11	CLK5	O	SE-CA10 LED drive (BU209F-E2) signal output
12	SEL_TU	O	LED (D903-TUNER ON) drive signal output
13	STB	O	STB signal output for NJU7313
14	ENABLE	O	Enable signal output for LA2785 and LV1010
15	CE	O	Chip enable signal output for LC7218
16	DATA IN	I	Data input from LC7218
17	CEO	O	Serial data output terminal for (E, EG) areas.
18	DATA I/O	I/O	Serial data input/output terminal for (E, EG) areas.
19	CE & DECK CS	I	Serial data communication starting signal input
20	CD & DECK SCLK IN	I	Serial clock input
21	CD & DECK SDA OUT	O	Serial data output
22	CD & DECK SDA IN	I	Serial data input
23	VRST	—	Not used
24	CDGM	—	Not used
25	DECK REQ	O	RS-CA10 request signal output
26	CD REQ	O	SL-CA10 request signal output
27	DPL & CHECK	I/O	Clock check signal
28	CR TIMER	I/O	Capacitor and resistor oscillation terminal
29	CEI	I	Serial data input terminal for (EG) area only
30	REMOCON	I	Remove control signal input
31	V-JOGB	I	Volume control signal input
32	V-JOGA	I	

Pin No.	Mark	I/O	Function
33	MIC DET	I	Michrophone connecting detect signal input
34	SYNC	I	AC power source input terminal
35	RESET	I	Reset signal input
36	SD	I	SD signal input for tuner circuit
37	STEREO	I	STEREO signal input for tuner circuit
38	X IN	I	Connected to the ceramic oscillator (F=4.19MHz)
39	X OUT	O	
40	Vss	—	GND terminal
41	MUTE	O	Muting signal output
42	POWER	O	Power control signal output
43	TU-JOGB	I	JOG (TUNING) control terminal
44	TU-JOGA	I	
45 ∫ 49	G9 ∫ G5	O	Grid signal output
50 ∫ 56	P42 ∫ P36	O	Segment signal output
57	G4	O	Grid signal output
58 ∫ 64	P35 ∫ P29	O	Segment signal output
65	G3	O	Grid signal output
66 ∫ 72	P28 ∫ P22	O	Segment signal output
73	G2	O	Grid signal output
74 ∫ 80	P21 ∫ P15	O	Segment signal output
81	G1	O	Grid signal output
82 ∫ 90	P14 ∫ P6	O	Segment signal output
91	Vcc	—	Power supply (+5V)
92 ∫ 96	P5 ∫ P1	O	Segment signal output
97	CS	I	Scan signal input
98	-VP	—	Negative power supply
99	AVSS	—	Connect to GND
100	VREF	—	Reference voltage input

● IC552 (LC65104A4F75): MICROCOMPUTER [For (E, EG) areas.]

Pin No.	Mark	I/O	Function
1	PB0	—	Not used
2	PB1	—	Not used
3	PB2	—	Not used
4	PB3	—	Not used
5	AV+	—	Not used
6	AV–	—	Not used
7	VSS	—	GND terminal
8	OSC1	I	Oscillating terminal (f=4MHz)
9	OSC2	O	Oscillating terminal (f=4MHz)
10	VDD	I	+5V
11	/RES	I	Reset signal input
12	TEST	—	Not used
13	R. DATA	I	RDS data signal input
14	/R. RES	O	RDS reset signal output
15	R. CLK	I	RDS clock signal input

Pin No.	Mark	I/O	Function
16	R. STRT	I	RDS start signal input
17	CEI	I	Serial data input detection terminal
18	CEO	O	Serial data output detection terminal
19	CLOCK	I/O	Serial clock input/output terminal
20	DATA	I/O	Serial data input/output terminal
21	PD0	—	Not used
22	PD1	—	Not used
23	PD2	—	Not used
24	PD3	—	Not used
25	PE0	—	Not used
26	PE1	—	Not used
27	SIGNAL	—	Not used
28	PA1	—	Not used
29	PA2	—	Not used
30	PA3	—	Not used

■ REPLACEMENT PARTS LIST

Notes: * Important safety notice:
Components identified by ⚠ mark have special characteristics important for safety.
Furthermore, special parts which have purposes of fire-retardant (resistors), high-quality sound (capacitors), low-noise (resistors), etc. are used.
When replacing any of components, be sure to use only manufacturer's specified parts shown in the parts list.
* The parenthesized indications in the Remarks columns specify the areas. (Refer to the cover page for area.)
Parts without these indications can be used for all areas.

Ref. No.	Part No.	Part Name & Description	Remarks
		INTEGRATED CIRCUIT(S)	
IC101	LA1832MH-TEL	FM/AM IF AMP/AM OSC	
IC102	LC7218M-TE-L	PLL FREQUENCY SYNTHESIZER	
IC201	AN6558SFE2	PHONO EQ AMP	
IC202	NJU7313AMT2	INPUT SELECTOR	
IC203	M5219FPTA	BUFFER AMP	
IC302	M62425FPE1	ELECTORONIC VOLUME	
IC550	LC7073M-TLM	SYNCH. ERROR CORRECTION	(E, EG)
IC551	LA2230M-TE-L	RDS DECODER	(E, EG)
IC551A	BA4558FDXT1	BUFFER AMP	
IC552	LC65104A4F75	MICROCOMPUTER	(E, EG)
IC581	MC14066BFEL	SIGNAL SELECTOR	
IC701	NJM2279MT2	VIDEO SIGNAL SELECTOR	
IC702	MC14052BFR2	VIDEO SIGNAL SELECTOR	
IC801	LA2785	DOLBY PRO LOGIC CONTROL	
IC802	LV1010N	DOLBY PRO LOGIC DRIVE	

Ref. No.	Part No.	Part Name & Description	Remarks
IC803	M62425FPE1	ELECTRONIC VOLUME	
IC804	M5219FPTA	BUFFER AMP	
IC901	M38198MC064F	SYSTEM CONTROL/FL DRIVE	
		TRANSISTOR(S)	
Q101, 102	2SC2787L	TRANSISTOR	
Q103, 104	2SC2785FE	TRANSISTOR	
Q106	UN4111	TRANSISTOR	(E, EB, EG)
Q106	UN411FTA	TRANSISTOR	(GC)
Q107, 108	2SC3311ARSTA	TRANSISTOR	
Q110	2SC3311ARSTA	TRANSISTOR	(E, EG)
Q191-193	2SC3311ARSTA	TRANSISTOR	(E, EB)
Q305-308	2SC3311A-Q	TRANSISTOR	
Q309, 310	UN4115	TRANSISTOR	
Q312, 313	2SA1309A-R	TRANSISTOR	
Q315, 316	2SC3311A-Q	TRANSISTOR	
Q317	UN4115	TRANSISTOR	

Ref. No.	Part No.	Part Name & Description	Remarks
Q503	2SC3940AQSTA	TRANSISTOR	⚠
Q550, 551	UN4211	TRANSISTOR	(E, EG)
Q552	UN4111	TRANSISTOR	(E, EG)
Q581	UN4211	TRANSISTOR	
Q582	UN4111	TRANSISTOR	
Q583	UN4211	TRANSISTOR	
Q601	2SC3940AQSTA	TRANSISTOR	⚠
Q602	2SA1534AQRTA	TRANSISTOR	⚠
Q603	2SC3940AQSTA	TRANSISTOR	⚠
Q604	2SD2144S	TRANSISTOR	
Q605	2SD2137PQTA	TRANSISTOR	⚠
Q606	2SB621A-R	TRANSISTOR	⚠
Q614	2SA1534AQRTA	TRANSISTOR	⚠
Q701	2SB621A-R	TRANSISTOR	⚠
Q702	2SD592ARSTA	TRANSISTOR	⚠
Q703	UN4211	TRANSISTOR	
Q801, 802	2SD1450RTA	TRANSISTOR	
Q803, 804	UN4115	TRANSISTOR	
Q805, 806	2SD1450RTA	TRANSISTOR	
Q807, 808	2SC3327-A	TRANSISTOR	
Q809	UN4115	TRANSISTOR	
Q811, 812	2SD2137PQTA	TRANSISTOR	⚠
Q901	UN4214TA	TRANSISTOR	
Q902-904	2SC3311A-Q	TRANSISTOR	
Q905	UN411FTA	TRANSISTOR	
Q906	2SC3311A-Q	TRANSISTOR	
Q907	UN4119	TRANSISTOR	
Q908	2SD2144S	TRANSISTOR	
		DIODE(S)	
D101	MA4051MTA	DIODE	⚠
D102	MA165	DIODE	
D302	MA165	DIODE	
D504	MA4082MTA	DIODE	⚠
D550, 551	MA165	DIODE	(E, EG)
D552	MA4051MTA	DIODE	(E, EG)⚠
D553	MA165	DIODE	(E, EG)
D601-604	RL1N4003N02	DIODE	⚠
D605	MA165	DIODE	
D606, 607	MA719TA	DIODE	
D609	MA4075HTA	DIODE	⚠
D610	MA4082LTA	DIODE	⚠
D611, 612	RL1N4003N02	DIODE	⚠
D613, 614	MA185TA	DIODE	⚠
D615	MA4051MTA	DIODE	⚠
D616	MA4062-H	DIODE	⚠
D617	MA4300M	DIODE	⚠
D618-621	MA185TA	DIODE	⚠
D622	MA4039MTA	DIODE	⚠
D631	MA700TA	DIODE	
D632	MA165	DIODE	

Ref. No.	Part No.	Part Name & Description	Remarks
D651, 652	MA165	DIODE	
D653	MA719TA	DIODE	
D701, 702	MA4056MTA	DIODE	⚠
D801-803	MA165	DIODE	
D808	MA4100MTA	DIODE	⚠
D810	MA165	DIODE	
D901, 902	MA165	DIODE	
D903	SPR505MDTT	L. E. D	
D910-912	1SS291TA	DIODE	
D932	MA165	DIODE	
D934-937	MA165	DIODE	
D939	MA165	DIODE	(E, EG)
D940	MA165	DIODE	(E, EB)
D941	MA165	DIODE	(EG, GC)
		VARIABLE RESISTOR(S)	
VR550	EVNDCBA03B53	RDS ADJ.	(E, EG)
VR901, 902	EVQW2BF2024B	VOLUME/TUNING	
		COMPONENT COMBINATION(S)	
Z101	RLA2Z002M-T	COMPONENT COMBINATION	(EG, GC)
Z102	RLI2Z006M-T	COMPONENT COMBINATION	
Z191	RLA6Z005M-T	COMPONENT COMBINATION	(E, EB)
Z901	RCDHC-278N	REMOTE SENSOR	
		COIL(S)	
L101	ELESNR68MA	COIL	
L103	ELEXTR47MA9	COIL	
L104	ELEXT1R0KA9	COIL	(E, EB, EG)
L105, 106	ELELN822KL	COIL	
L151	SLM1B10M-1M	COIL	(E, EB, EG)
L191	ELESNR68MA	COIL	
L550-552	ELEXT101KA9	COIL	(E, EG)
L801	ELESN101KA	COIL	
L901	RLQA100JT-Y	COIL	
		FILTER(S)	
CF201	RLFFETNGD01L	CERAMIC FILTER	(E, EB, EG)
CF201	RLFFETWND01M	CERAMIC FILTER	(GC)
CF202	RLFFETMGD01L	CERAMIC FILTER	(E, EB, EG)
CF202	RLFFETWND01M	CERAMIC FILTER	(GC)
		OSCILLATOR(S)	
X101	RSXZ456KM07M	OSCILLATOR(456KHz)	
X102	RLFDGT05DD	OSCILLATOR(10. 65MHz)	
X103	RSXC7M20S05T	OSCILLATOR(7. 2MHz)	
X550	RVBCST4R00MT	OSCILLATOR(4MHz)	(E, EG)

Ref. No.	Part No.	Part Name & Description	Remarks
X551	RSXZ456KM07M	OSCILLATOR(456KHz)	(E, EG)
X552	RVBCST4R00MT	OSCILLATOR(4MHz)	(E, EG)
X801	EF0EC8004T4	OSCILLATOR(8MHz)	
X901	RSXC4M19S02T	OSCILLATOR(4.19MHz)	
		DISPLAY TUBE(S)	
FL901	RSL0216-F	DISPLAY TUBE	
		FM FRONT END(S)	
Z120	RAL0019	FM FRONT END	(E, EB, EG)
Z120	RAL0006	FM FRONT END	(GC)
		SWITCH(ES)	
S901	EVQ21405R	FM	
S902	EVQ21405R	AM(MW/LW)	
S903	EVQ21405R	TUNING MODE	
S904	EVQ21405R	TIMER PLAY	
S905	EVQ21405R	TIMER REC	
S906	EVQ21405R	CLOCK/TIMER MODE	
S907	EVQ21405R	CLOCK/TIMER SET	
S911	EVQ21405R	INPUT SELECTOR	
S912	EVQ21405R	DISPLAY MODE	(E, EG)
S913	EVQ21405R	PTY SEL	(E, EG)
S914	EVQ21405R	PTY SEARCH	(E, EG)
		RELAY(S)	
RL601	RSY0017M-0	RELAY	⚠
		CONNECTOR(S) AND SOKET	
CN701	RJT057W012-1	CONNECTOR(12P)	
CN801	RJT057W012-1	CONNECTOR(12P)	
CN101A	RJT057W007-1	CONNECTOR(7P)	
CN101B	RJU057W007	SOCKET(7P)	
CN102A	RJT057W007-1	CONNECTOR(7P)	
CN102B	RJU057W007	SOCKET(7P)	
CN501A	RJT057W007-1	CONNECTOR(7P)	(E, EG)
CN501B	RJU057W007	SOCKET(7P)	(E, EG)
CN901A	RJS1A6820	CONNECTOR(20P)	
CN901B	RJS1A6820	CONNECTOR(20P)	
CN902A	RJS1A6820	CONNECTOR(20P)	
CN902B	RJS1A6820	CONNECTOR(20P)	
CP801	RJU057W012	SOCKET(12P)	
CP701	RJU057W012	SOCKET(12P)	
JK601	RJT065K15	CONNECTOR(15P)	
JK602	RJT065K19	CONNECTOR(19P)	
JK603	RJT065K20	CONNECTOR(20P)	

Ref. No.	Part No.	Part Name & Description	Remarks
		JACK(S)	
JK101	RJH5210M	FM/AM ANT	(E, EB, EG)
JK101	RJH5404M	FM/AM ANT	(GC)
JK201	SJF3068-7N	EXT OUT	
JK202	SJF3069-5N	EXT IN/PHONO	
JK701	SJF3068-7N	VCR OUT	
JK702	SJF3069-5N	VCR IN/VDP IN(AUDIO)	
JK703	SJF3069-3N	VCR/TV/VDP IN-OUT(VIDEO)	
		EARTH PLATE(S)	
E601, 602	SNE1004-2	EARTH PLATE	

■REPLACEMENT PARTS LIST

Notes: * The parenthesized indications in the Remarks columns specify the areas. (Refer to the cover page for area.) Parts without these indications can be used for all areas.

Ref. No.	Part No.	Part Name & Description	Remarks
		CABINET AND CHASSIS	
1	RHD30007-K1	SCREW	
2	RKM0302-K	CABINET	
3	XTB3+8JFZ	SCREW	
4	REZ0813	CONNECTOR ASS'Y(6P)	
5	RGR0216B-G	REAR PANEL	(E, EB)
5	RGR0216B-H	REAR PANEL	(EG)
5	RGR0216B-J	REAR PANEL	(GC)
6	RFKJTVC910-K	BOTTOM CHASSIS ASS'Y	
6-1	RKA0011-3	SET FOOT	
7	RMN0337	P. C. B. HOLDER	(EB, GC)
8	RMN0195	FL HOLD PIECE	
9	RMN0370	FL HOLDER	
10	REZ0777	FLAT CABLE(20P)	
11	RFKGTCA10E-K	FRONT PANEL ASS'Y	(E, EG)

Ref. No.	Part No.	Part Name & Description	Remarks
11	RFKGTCA10EBK	FRONT PANEL ASS'Y	(EB, GC)
12	RGK0790-1S	VOLUME ORNAMENT	
13	RGL0315-Q	PANEL LIGHT	
14	RFKNTCA10EA	SET BUTTON ASS'Y	(E, EB)
14	RFKNTCA10EGA	SET BUTTON ASS'Y	(EG, GC)
15	RFKNTCA10EB	SELECTOR BUTTON ASS'Y	(E, EB)
15	RFKNTCA10EGB	SELECTOR BUTTON ASS'Y	(EG, GC)
16	RFKNTCA10EC	PANEL LIGHT ORNAMENT ASS'Y	(E, EB)
16	RFKNTCA10EGC	PANEL LIGHT ORNAMENT ASS'Y	(EG, GC)
17	RGW0242-K	VOLUME KNOB	
18	RHN90001	NUT	
19	XTBS26+8J	SCREW	
20	SHE185-2	P. C. B. SUPPORT	
21	XTBS3+8JFZ1	SCREW	
22	XTB3+16JFZ	SCREW	
23	RHD30070	GND SCREW	
24	RMN0059	P. C. B. SUPPORT	

■RESISTORS AND CAPACITORS

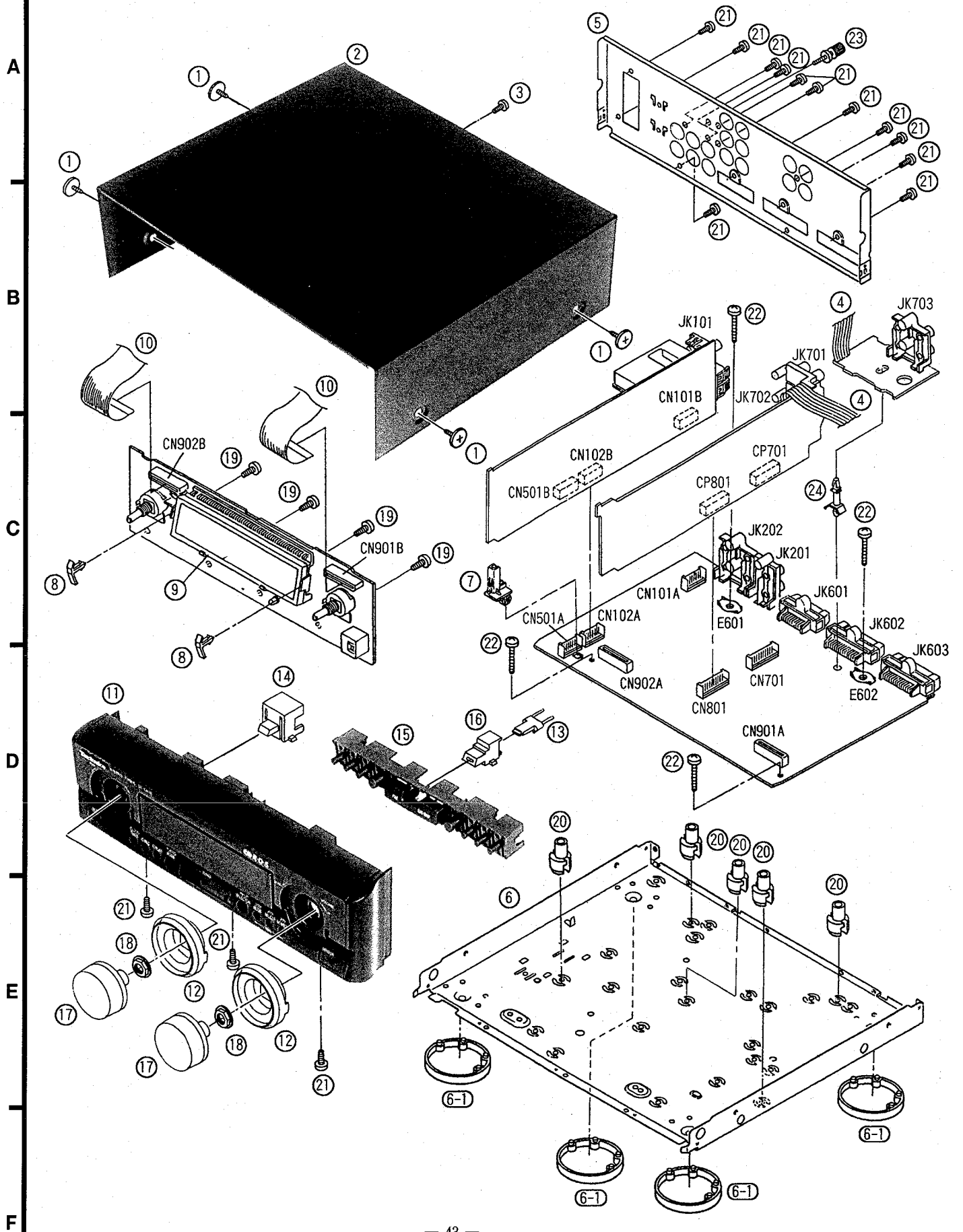
Notes: * Capacity values are in microfarads (uF) unless specified otherwise, P=Pico-farads (pF) F=Farads (F)
* Resistance values are in ohms, unless specified otherwise, 1K=1,000 (OHM), 1M=1,000k (OHM)

Ref. No.	Part No.	Values & Remarks
		RESISTORS
R103	ERDS2TJ101	1/4W 100 (E, EB, EG)
R103	ERDS2TJ271T	1/4W 270 (GC)
R104	ERDS2TJ103	1/4W 10K (E, EB, EG)
R104	ERDS2TJ822T	1/4W 8.2K (GC)
R105	ERDS2TJ471	1/4W 470
R106	ERDS2TJ474	1/4W 470K
R107	ERDS2TJ331	1/4W 330
R108	ERDS2TJ474	1/4W 470K
R109	ERDS2TJ331	1/4W 330
R110	ERDS2TJ102	1/4W 1K
R112	ERDS2TJ104	1/4W 100K
R113	ERDS2TJ103	1/4W 10K
R114	ERDS2TJ562	1/4W 5.6K
R115	ERDS2TJ561	1/4W 560
R116	ERDS2TJ102	1/4W 1K
R117	ERDS2TJ823T	1/4W 82K (E, EB, EG)
R117	ERDS2TJ273T	1/4W 27K (GC)
R118	ERDS2TJ562	1/4W 5.6K

Ref. No.	Part No.	Values & Remarks
R119	ERDS2TJ103	1/4W 10K (E, EG)
R119	ERDS2TJ822T	1/4W 8.2K (EB)
R119	ERDS2TJ682T	1/4W 6.8K (GC)
R120	ERDS2TJ473	1/4W 47K
R121	ERDS2TJ332	1/4W 3.3K
R122	ERDS2TJ272T	1/4W 2.7K
R124	ERDS2TJ271	1/4W 270
R125, 126	ERDS2TJ152	1/4W 1.5K
R127	ERDS2TJ103	1/4W 10K
R128	ERDS2TJ820	1/4W 82
R129	ERDS2TJ473	1/4W 47K
R130	ERDS2TJ103	1/4W 10K
R132	ERDS2TJ103	1/4W 10K
R133-137	ERDS2TJ102	1/4W 1K
R138	ERDS2TJ103	1/4W 10K
R139, 140	ERDS2TJ272T	1/4W 2.7K
R141, 142	ERDS2TJ102	1/4W 1K
R143, 144	ERDS2TJ222	1/4W 2.2K
R145, 146	ERDS2TJ821	1/4W 820 (E, EB, EG)
R145, 146	ERDS2TJ102T	1/4W 1K (GC)
R147, 148	ERDS2TJ474	1/4W 470K

Ref. No.	Part No.	Values & Remarks
R149	ERDS2TJ680T	1/4W 68
R171, 172	ERDS2TJ102	1/4W 1K
R173	ERDS2TJ471	1/4W 470
R175	ERDS2TJ102	1/4W 1K
R176	ERDS2TJ391	1/4W 390
R177	ERDS2TJ472	1/4W 4.7K (E, EG)
R191	ERDS2TJ103	1/4W 10K (E, EB)
R192	ERDS2TJ122	1/4W 1.2K (E, EB)
R193	ERDS2TJ182	1/4W 1.8K (E, EB)
R194	ERDS2TJ122	1/4W 1.2K (E, EB)
R195	ERDS2TJ222	1/4W 2.2K (E, EB)
R201, 202	ERDS2TJ102	1/4W 1K
R203, 204	ERDS2TJ473	1/4W 47K
R205, 206	ERDS2TJ331	1/4W 330
R207, 208	ERDS2TJ271	1/4W 270
R209, 210	ERDS2TJ184T	1/4W 180K
R211, 212	ERDS2TJ123	1/4W 12K
R213, 214	ERDS2TJ680T	1/4W 68
R215, 216	ERDS2TJ272T	1/4W 2.7K
R217, 218	ERDS2TJ392T	1/4W 3.9K
R219, 220	ERDS1FVJ221T	1/2W 220 ⚠

■CABINET PARTS LOCATION



Ref. No.	Part No.	Values & Remarks
R221, 222	ERDS2TJ752T	1/4W 7.5K
R223, 224	ERDS2TJ562	1/4W 5.6K
R225, 226	ERDS2TJ472	1/4W 4.7K
R227, 228	ERDS2TJ332	1/4W 3.3K
R229-231	ERDS2TJ222	1/4W 2.2K
R233, 234	ERDS2TJ223	1/4W 22K
R235, 236	ERDS2TJ822	1/4W 8.2K
R237, 238	ERDS2TJ123	1/4W 12K
R239, 240	ERDS2TJ102	1/4W 1K
R305, 306	ERDS2TJ223	1/4W 22K
R308, 309	ERDS2TJ153	1/4W 15K
R310	ERDS2TJ182	1/4W 1.8K
R315, 316	ERDS2TJ101	1/4W 100
R317-320	ERDS2TJ471	1/4W 470
R323, 324	ERDS2TJ103	1/4W 10K
R325, 326	ERDS2TJ123	1/4W 12K
R327, 328	ERDS2TJ182	1/4W 1.8K
R329, 330	ERDS2TJ102	1/4W 1K
R331, 332	ERDS2TJ222	1/4W 2.2K
R337, 338	ERDS2TJ391	1/4W 390
R341, 342	ERDS2TJ103	1/4W 10K
R343	ERDS2TJ105T	1/4W 1M
R344	ERDS2TJ102	1/4W 1K
R345, 346	ERDS2TJ104	1/4W 100K
R347, 348	ERDS2TJ102	1/4W 1K
R349	ERDS2TJ104	1/4W 100K
R350	ERDS2TJ105T	1/4W 1M
R351	ERDS2TJ332	1/4W 3.3K
R352	ERDS2TJ182	1/4W 1.8K
R353, 354	ERDS2TJ152	1/4W 1.5K
R355, 356	ERDS2TJ472	1/4W 4.7K
R357	ERDS2TJ105T	1/4W 1M
R359, 360	ERDS2TJ224T	1/4W 220K
R361	ERDS2TJ102	1/4W 1K
R362	ERDS2TJ223	1/4W 22K
R376	ERDS2TJ223	1/4W 22K
R378, 379	ERDS2EJ121	1/4W 120
R380	ERDS2TJ102	1/4W 1K
R381	ERDS2TJ223	1/4W 22K
R382	ERDS2TJ105T	1/4W 1M
R383	ERDS2TJ472	1/4W 4.7K
R393, 394	ERDS2TJ104	1/4W 100K
R396	ERDS2TJ102	1/4W 1K
R397, 398	ERDS2TJ150T	1/4W 15
R506	ERDS2TJ152	1/4W 1.5K
R507	ERDS2TJ331	1/4W 330
R508, 509	ERDS2TJ682T	1/4W 6.8K
R511, 512	ERDS2TJ122	1/4W 1.2K
R550	ERDS2TJ564	1/4W 560K (E, EG)
R551	ERDS2TJ223	1/4W 22K (E, EG)
R552	ERDS2TJ103	1/4W 10K (E, EG)
R553, 554	ERDS2TJ102	1/4W 1K (E, EG)

Ref. No.	Part No.	Values & Remarks
R555	ERDS2TJ104	1/4W 100K (E, EG)
R556	ERDS2TJ332	1/4W 3.3K (E, EG)
R557	ERDS2TJ103	1/4W 10K (E, EG)
R558	ERDS2TJ102	1/4W 1K (E, EG)
R559	ERDS2TJ562	1/4W 5.6K (E, EG)
R560	ERDS2TJ820	1/4W 82 (E, EG)
R562	ERDS2TJ473	1/4W 47K (E, EG)
R563	ERDS2TJ332	1/4W 3.3K (E, EG)
R564	ERDS2TJ155	1/4W 1.5M (E, EG)
R565-567	ERDS2TJ332	1/4W 3.3K (E, EG)
R568-571	ERDS2TJ101	1/4W 100 (E, EG)
R572	ERDS2TJ103	1/4W 10K (E, EG)
R573	ERDS2TJ471	1/4W 470 (E, EG)
R574-576	ERDS2TJ102	1/4W 1K (E, EG)
R581	ERDS2TJ104	1/4W 100K
R582	ERDS2TJ102	1/4W 1K
R601, 602	ERD2FCVJ4R7T	1/4W 4.7 ⚠
R603, 604	ERDS2TJ102	1/4W 1K
R605	ERDS2TJ101	1/4W 100
R606, 607	ERDS2TJ393	1/4W 39K
R609	ERD25FJ2R2	1/4W 2.2 ⚠
R610	ERDS2TJ332	1/4W 3.3K
R612	ERDS2TJ472	1/4W 4.7K
R613, 614	ERDS2TJ682T	1/4W 6.8K
R615	ERDS2TJ103	1/4W 10K
R616	ERD25FVJ4R7T	1/4W 4.7 ⚠
R621, 622	ERDS2TJ151	1/4W 150
R623, 624	ERDS2TJ682T	1/4W 6.8K
R631-634	ERDS2TJ102	1/4W 1K
R635, 636	ERDS2TJ222	1/4W 2.2K
R637	ERDS2TJ100	1/4W 10
R641, 642	ERDS2TJ471	1/4W 470
R646	ERDS2TJ562	1/4W 5.6K
R647	ERDS2TJ123	1/4W 12K
R651-654	ERDS2TJ2R2T	1/4W 2.2
R656	ERDS2TJ221	1/4W 220
R701, 702	ERDS2TJ103	1/4W 10K
R703, 704	ERDS2TJ822	1/4W 8.2K
R705, 706	ERDS2TJ332	1/4W 3.3K
R707, 708	ERDS2TJ472	1/4W 4.7K
R709, 710	ERDS2TJ103	1/4W 10K
R711, 712	ERDS2TJ822	1/4W 8.2K
R718	ERDS2TJ680T	1/4W 68
R719, 720	ERDS2TJ750	1/4W 75
R721	ERDS2TJ680T	1/4W 68
R722, 723	ERDS2TJ102	1/4W 1K
R724	ERDS2TJ103	1/4W 10K
R726, 727	ERDS2TJ103	1/4W 10K
R801, 802	ERDS2TJ392T	1/4W 3.9K
R803-806	ERDS2TJ222	1/4W 2.2K
R807, 808	ERDS2TJ104	1/4W 100K
R809, 810	ERDS2TJ102	1/4W 1K

Ref. No.	Part No.	Values & Remarks
R811	ERDS2TJ105T	1/4W 1M
R813	ERDS2TJ472	1/4W 4.7K
R814-816	ERDS2TJ332	1/4W 3.3K
R817	ERDS2TJ333	1/4W 33K
R818	ERDS2TJ183T	1/4W 18K
R819, 820	ERDS2TJ102	1/4W 1K
R821	ERDS2TJ473	1/4W 47K
R822	ERDS2TJ334	1/4W 330K
R823	ERDS2TJ102	1/4W 1K
R824	ERDS2TJ105T	1/4W 1M
R828	ERDS2TJ222	1/4W 2.2K
R829, 830	ERDS2TJ473	1/4W 47K
R831	ERDS2TJ183T	1/4W 18K
R832	ERDS2TJ153	1/4W 15K
R833, 834	ERDS2TJ333	1/4W 33K
R835, 836	ERDS2TJ222	1/4W 2.2K
R837, 838	ERDS2TJ332	1/4W 3.3K
R839, 840	ERDS2TJ103	1/4W 10K
R841, 842	ERDS2TJ104	1/4W 100K
R843, 844	ERDS2TJ222	1/4W 2.2K
R845	ERDS2TJ182	1/4W 1.8K
R846	ERDS2TJ391	1/4W 390
R847, 848	ERDS2TJ102	1/4W 1K
R849	ERDS2TJ391	1/4W 390
R850	ERDS2TJ105T	1/4W 1M
R851, 852	ERDS2TJ102	1/4W 1K
R853, 854	ERDS2TJ223	1/4W 22K
R855, 856	ERDS2TJ102	1/4W 1K
R857, 858	ERDS2EJ121	1/4W 120
R859	ERDS2TJ472	1/4W 4.7K
R860	ERDS2TJ182	1/4W 1.8K
R861	ERDS2TJ105T	1/4W 1M
R862	ERDS2TJ472	1/4W 4.7K
R863-865	ERDS2TJ473	1/4W 47K
R866-868	ERDS2TJ102	1/4W 1K
R871, 872	ERDS2TJ4R7T	1/4W 4.7
R873	ERD2FCVJ4R7T	1/4W 4.7 ⚠
R874, 875	ERDS2TJ221	1/4W 220
R876, 877	ERDS2TJ333	1/4W 33K
R901	ERDS2TJ821	1/4W 820
R902	ERDS2TJ102	1/4W 1K
R903	ERDS2TJ122	1/4W 1.2K
R904	ERDS2TJ152	1/4W 1.5K
R905	ERDS2TJ182	1/4W 1.8K
R906	ERDS2TJ222	1/4W 2.2K
R907	ERDS2TJ332	1/4W 3.3K
R908	ERDS2TJ223	1/4W 22K
R909	ERDS2TJ103	1/4W 10K
R910	ERDS2TJ821	1/4W 820
R911	ERDS2TJ102	1/4W 1K
R912	ERDS2TJ122	1/4W 1.2K
R913	ERDS2TJ152	1/4W 1.5K

Ref. No.	Part No.	Values & Remarks
R914	ERDS2TJ182	1/4W 1.8K
R915	ERDS2TJ222	1/4W 2.2K
R916-919	ERDS2TJ103	1/4W 10K
R920-922	ERDS2TJ102	1/4W 1K
R923	ERDS2TJ391	1/4W 390
R924	ERDS2TJ102	1/4W 1K
R925	ERDS2TJ221	1/4W 220
R926	ERDS2TJ101	1/4W 100
R928-933	ERDS2TJ102	1/4W 1K
R934	ERDS2TJ101	1/4W 100
R935	ERDS2TJ102	1/4W 1K
R936	ERDS2TJ101	1/4W 100
R938	ERDS2TJ102	1/4W 1K
R939	ERDS2TJ101	1/4W 100
R940, 941	ERDS2TJ393	1/4W 39K
R942	ERDS2TJ562	1/4W 5.6K
R943	ERDS2TJ223	1/4W 22K
R944	ERDS2TJ473	1/4W 47K
R945, 946	ERDS2TJ102	1/4W 1K
R947, 948	ERDS2TJ223	1/4W 22K
R949	ERDS2TJ103	1/4W 10K
R950	ERDS2TJ102	1/4W 1K
R951	ERDS2TJ104	1/4W 100K
R952, 953	ERDS2TJ102	1/4W 1K
R954	ERDS2TJ101	1/4W 100
R955	ERDS2TJ824	1/4W 820K
R956	ERDS2TJ101	1/4W 100
R957	ERDS2TJ102	1/4W 1K
R958	ERDS2TJ471	1/4W 470
R959	ERDS2TJ103	1/4W 10K
R960	ERDS2TJ472	1/4W 4.7K
R961	ERDS2TJ103	1/4W 10K
R962	ERDS2TJ473	1/4W 47K
R963-965	ERDS2TJ472	1/4W 4.7K
R966	ERDS2TJ123	1/4W 12K
R967	ERDS2TJ472	1/4W 4.7K
R968, 969	ERDS2TJ152	1/4W 1.5K
R971	ERDS2TJ104	1/4W 100K
R972	ERDS2TJ820	1/4W 82
R973	ERDS2TJ151	1/4W 150
R974, 975	ERDS2TJ473	1/4W 47K
R976	ERDS2TJ272T	1/4W 2.7K
R977	ERDS2TJ102	1/4W 1K
R978-992	ERDS2TJ104	1/4W 100K
R993-995	ERDS2TJ102	1/4W 1K
R997, 998	ERDS2TJ223	1/4W 22K
R999	ERDS2TJ102	1/4W 1K
		CAPACITORS
C101	ECBT1C103NS5	16V 0.01U
C103	ECBT1C103NS5	16V 0.01U

Ref. No.	Part No.	Values & Remarks
C104, 105	ECBT1H102KB5	50V 1000P
C106	ECBT1C103NS5	16V 0.01U
C107	ECBT1H473ZF5	50V 0.047U
C108	ECBT1H100JC5	50V 10P (E, EB)
C108	ECBT1H8R2KC5	50V 8.2P (EG, GC)
C109, 110	ECBT1C103NS5	16V 0.01U
C111	ECEA1EKA4R7B	25V 4.7U
C112	ECBT1C103NS5	16V 0.01U
C113	ECBT1H102KB5	50V 1000P
C114	RCE1HKA3R3BG	50V 3.3U
C115	ECEA1EKA4R7B	25V 4.7U
C116	ECBT1C822KS5	16V 8200P
C117	ECQB1H561JF3	50V 560P (E, EB, EG)
C117	ECQB1H102JF3	50V 1000P (GC)
C118, 119	ECFR1C103KR	16V 0.01U
C120, 121	ECEA1HKA010B	50V 1U
C122	ECEA1HKA2R2B	50V 2.2U
C123	ECEA1HKA010B	50V 1U
C124	ECBT1H102KB5	50V 1000P
C125	ECBT1H150JC5	50V 15P
C126	ECBT1H473ZF5	50V 0.047U
C127	RCE1CKA220BG	16V 22U
C128	ECBT1H102KB5	50V 1000P
C129, 130	RCE0JKA101BV	6.3V 100U
C132	ECBT1H102KB5	50V 1000P
C133, 134	ECBT1H270JU5	50V 27P
C135, 136	ECBT1C103KS5	16V 0.01U
C137, 138	ECBT1H561KB5	50V 560P
C139, 140	ECBT1C682KR5	16V 6800P (E, EB, EG)
C139, 140	ECBT1C562KR5	16V 5600P (GC)
C141-144	ECEA1HKA010B	50V 1U
C145	ECBT1H220JC5	50V 22P
C148	ECBT1C103NS5	16V 0.01U
C149	ECBT1H104ZF5	50V 0.1U
C171, 172	ECBT1H102KB5	50V 1000P
C173	RCE1CKA220BG	16V 22U
C174	RCE1CKA100BG	16V 10U
C181	ECBT1H471KB5	50V 470P (E, EB, EG)
C196	ECBT1H102KB5	50V 1000P
C201, 202	ECBT1H180J5	50V 18P
C203, 204	ECBT1H151KB5	50V 150P
C205, 206	ECBT1H102KB5	50V 1000P
C207, 208	RCE1AKA330BG	10V 33U
C209, 210	ECBT0J223MS5	6.3V 0.022U
C211, 212	ECBT1C682KR5	16V 6800P
C213, 214	RCE1CKA100BG	16V 10U
C215	ECBT1E103ZF	25V 0.01U
C216	RCE1AKA101BG	10V 100U
C217	ECBT1E103ZF	25V 0.01U
C218	RCE1AKA101BG	10V 100U
C219-222	ECBT1H101KB5	50V 100P
C223, 224	ECBT1H104ZF5	50V 0.1U

Ref. No.	Part No.	Values & Remarks
C225-227	ECBT1H470J5	50V 47P
C231, 232	ECBT1E103ZF	25V 0.01U
C233, 234	ECBT1H102KB5	50V 1000P
C235, 236	ECBT1H101KB5	50V 100P
C305, 306	RCE1CKA100BG	16V 10U
C335, 336	RCE1CKA100BG	16V 10U
C337, 338	RCE1CKA220BG	16V 22U
C339, 340	RCE1CKA100BG	16V 10U
C341, 342	ECEA1CKN100B	16V 10U
C343	RCE1CKA100BG	16V 10U
C344, 345	ECBT1H470J5	50V 47P
C348	ECEA1CKA330B	16V 33U
C349	RCE1HKA3R3BG	50V 3.3U
C350	RCE0JKA470BG	6.3V 47U
C351, 352	RCE1CKA100BG	16V 10U
C355	ECEA1CKA330B	16V 33U
C356	ECBT1H104ZF5	50V 0.1U
C357	RCE1AKA101BG	10V 100U
C361, 362	ECBT1H221KB5	50V 220P
C365	RCE0JKA470BG	6.3V 47U
C371, 372	ECBT1H101KB5	50V 100P
C391, 392	RCE1CM101BV	16V 100U
C393, 394	ECBT1H102KB5	50V 1000P
C509	ECBT1E103ZF	25V 0.01U
C510	RCE1AKA101BG	10V 100U
C550	RCE0JKA101BV	6.3V 100U (E, EG)
C551	RCE1CKA220BG	16V 22U (E, EG)
C551A	ECBT1H331KB5	50V 330P
C552	RCE1CKA100BG	16V 10U (E, EG)
C552A	ECBT1H331KB5	50V 330P
C553	ECEA1EKA4R7B	25V 4.7U (E, EG)
C553A	ECBT1E103ZF	25V 0.01U
C554	RCE1CKA100BG	16V 10U (E, EG)
C554A	ECBT1E103ZF	25V 0.01U
C555	ECEA1EKA4R7B	25V 4.7U (E, EG)
C556	RCE1CKA100BG	16V 10U (E, EG)
C557	ECBT1H102KB5	50V 1000P (E, EG)
C558	RCE0JKA101BV	6.3V 100U (E, EG)
C559, 560	ECEA1HKA010B	50V 1U (E, EG)
C561	ECFR1C223KR	16V 0.022U (E, EG)
C562, 563	ECFR1C333KR	16V 0.033U (E, EG)
C564	ECBT1C332KR5	16V 3300P (E, EG)
C565	ECBT1C682KR5	16V 6800P (E, EG)
C566	ECBT1C332KR5	16V 3300P (E, EG)
C567	ECBT1C103KS5	16V 0.01U (E, EG)
C568-570	ECBT1H102KB5	50V 1000P (E, EG)
C581, 582	ECBT1H104ZF5	50V 0.1U
C601, 602	ECKT1H223ZF	50V 0.022U
C603	ECA1EM102B	25V 1000U ⚠
C604	RCE1EM471BV	25V 470U ⚠
C605, 606	ECBT1E103ZF	25V 0.01U
C607	RCE1CKA100BG	16V 10U

Ref. No.	Part No.	Values & Remarks
C608	RCE1CM101BV	16V 100U
C609	ECBT1H102KB5	50V 1000P
C610, 611	ECBT1H104ZF5	50V 0.1U
C612	RCE1EM471BV	25V 470U ⚠
C613	ECBT1E103ZF	25V 0.01U
C614	RCE1CKA100BG	16V 10U
C615	ECA1EM101B	25V 100U
C616	ECA1HM470B	50V 47U
C617	ECA1HM470B	50V 47U ⚠
C618	ECA1JM470B	63V 47U
C619	ECBT1E103ZF	25V 0.01U
C620	RCE1VKA100BG	35V 10U
C622	RCE1VKA100BG	35V 10U
C631-636	ECBT1H101KB5	50V 100P
C637	ECBT1H102KB5	50V 1000P
C651, 652	ECBT1H104ZF5	50V 0.1U
C653, 654	ECBT1H102KB5	50V 1000P
C655	RCE1CM101BV	16V 100U
C656	RCE1VM471BV	35V 470U
C657	ECBT1H102KB5	50V 1000P
C701-706	ECBT1H101KB5	50V 100P
C707	ECBT1H102KB5	50V 1000P
C709	ECBT1H470J5	50V 47P
C711	ECBT1H470J5	50V 47P
C712, 713	ECBT1H104ZF5	50V 0.1U
C714, 715	RCE1CKA100BG	16V 10U
C716, 717	ECBT1H104ZF5	50V 0.1U
C722, 723	RCE1CKA100BG	16V 10U
C801	ECFR1C223KR	16V 0.022U
C802	ECFR1E473KR	25V 0.047U
C803	RCE0JKA221BV	6.3V 220U
C804-807	RCE1CKA100BG	16V 10U
C808	RCE0JKA221BV	6.3V 220U
C809, 810	ECEA1HKA010B	50V 1U
C811, 812	ECQV1H104JM3	50V 0.1U
C813	RCE1HKAR47BG	50V 0.47U

Ref. No.	Part No.	Values & Remarks
C814	ECEA1VKA4R7B	35V 4.7U
C815	RCE1HKAR47BG	50V 0.47U
C816	ECEA1VKA4R7B	35V 4.7U
C817	ECEA1HKAR15B	50V 0.15U
C818	RCE1HKA3R3BG	50V 3.3U
C819, 820	ECQV1H154JM3	50V 0.15U
C821	RCE1HKA3R3BG	50V 3.3U
C822	ECEA1HKAR15B	50V 0.15U
C823	ECEA1VKA4R7B	35V 4.7U
C824	RCE1HKAR47BG	50V 0.47U
C825	ECEA1VKA4R7B	35V 4.7U
C826	RCE1HKAR47BG	50V 0.47U
C827, 828	ECQV1H104JM3	50V 0.1U
C829	RCE1CKA470BG	16V 47U
C830	ECQV1H474JM3	50V 0.47U
C831	ECBA1H681KB5	50V 680P
C832	ECBT1H560J5	50V 56P
C833, 834	ECBT1H101KB5	50V 100P
C835	ECEA1HKA2R2B	50V 2.2U
C836	ECEA1HKA010B	50V 1U
C837	RCE1CKA101BV	16V 100U
C838	ECBT1E223ZF	25V 0.022U
C839	ECA1AM471B	10V 470U
C840	RCE1CKA220BG	16V 22U
C841, 842	RCE1HKA3R3BG	50V 3.3U
C843, 844	RCE1CKA220BG	16V 22U
C845	RCE0JKA221BV	6.3V 220U
C846	ECEA1HKA010B	50V 1U
C847	ECQB1H393JF3	50V 0.039U
C848	ECFR1E152KR	25V 1500P
C849	ECQV1H333JM3	50V 0.033U
C850	RCE1CKA101BV	16V 100U
C851	ECBT1E223ZF	25V 0.022U
C852	ECBA1H681KB5	50V 680P
C853, 854	RCE1HKA3R3BG	50V 3.3U
C855-858	ECBT1E103ZF	25V 0.01U

Ref. No.	Part No.	Values & Remarks
C859, 860	ECBT1H101KB5	50V 100P
C861, 862	RCE1CKA100BG	16V 10U
C863-866	RCE1CKA220BG	16V 22U
C867, 868	RCE1CKA100BG	16V 10U
C869	ECEA1CKA330B	16V 33U
C870	RCE1CKA100BG	16V 10U
C871, 872	ECBT1H470J5	50V 47P
C873	RCE0JKA470BG	6.3V 47U
C875, 876	RCE1CKA100BG	16V 10U
C877	RCE0JKA470BG	6.3V 47U
C878	ECBT1E103ZF	25V 0.01U
C880	RCE1AKA101BG	10V 100U
C881	ECA1CM221B	16V 220U
C882	RCE1CKA101BV	16V 100U
C887	ECBT1H102KB5	50V 1000P
C888, 889	ECBT1H221KB5	50V 220P
C891	ECEA1AN101XB	10V 100U
C892	ECBT1H221KB5	50V 220P
C893	ECBT1E223ZF	25V 0.022U
C901-904	ECBT1H471KB5	50V 470P
C905, 906	ECBT1H102KB5	50V 1000P
C907	ECBT1H104ZF5	50V 0.1U
C908	ECBT1E103ZF	25V 0.01U
C909	ECEA1HKS2R2B	50V 2.2U
C910	RCE1CKA100BG	16V 10U
C911	ECBT1H270JU5	50V 27P
C912	ECBT1H220GC5	50V 22P
C915	ECBT1E103ZF	25V 0.01U
C916, 917	ECEA1VKA330B	35V 33U
C918	ECBT1H104ZF5	50V 0.1U
C919	RCE0JU102BV	6.3V 1000U
C921	ECA0JKF101B	6.3V 100U
C923	RCE0JKA221BV	6.3V 220U
C924-926	ECBT1H102KB5	50V 1000P
C928, 929	ECBT1H101KB5	50V 100P
C930, 931	ECBT1H102KB5	50V 1000P

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